

**FORMING A COMPLETE RECORD OF THE PROCEEDINGS OF ALL PUBLIC COMPANIES.**

[The MINING JOURNAL is Registered at the General Post Office as a Newspaper, and for Transmission Abroad.]

**LONDON, SATURDAY, AUGUST 9, 1873.**

[ WITH ] { PRICE ..... FIVEPENCE.  
[ SUPPLEMENT. ] { PER ANNUM, BY POST. £1 4s.

**GEORGE BUDGE, STOCK AND SHARE DEALER.**  
**THE ROYAL EXCHANGE BUILDINGS, LONDON, E.C. (Established 23 years), is a SELLER at net prices of—**  
 Mary: 20 East Ward, 23 1/4; 120 South Tottenham, 17s. 6d.; 50 Prince of Wales, 20s. 6d.; 50 New Blue Hills, 37s. 6d.; 50 New 123 lbs. 9d.; 75 St. Agnes's Consoles, 20 Wheat, 41s. 6d.; 113 1/2 Silver Lake, 25 1/2 South Carolina, 10 Van, 23 1/2; 50 West London, 25 Tankerville, 23 1/4; 100 East Chiverton, 10 East Lovell, 11 1/4; 50 100 Fortescue, 11s. 6d.; 10 West Polbreten, 23; 100 Boscawell Down, 20; 100 Beward, 12s. 6d.; 50 Exceoloid, 23 West Esgrail Lie; 2 Carn 100 Breught, 10s.; 200 Medlyn Morn, 10s.; 100 Kilfrith, 11s.; 125 1/2 West Green, 21s. 6d.; 50 Rookhope Valley, 23 1/2; 200 Wheel 100 West Green, 21s.; 200 Wheel Crebor, 23 1/4; 100 West Britain, 23 1/4; 200 East Canada, 21 1/2; 5 Minera, 23s.; 200 Grogwinin, 22 1/2; 200 Creek, 23 1/4; 200 Gold Run, 2s.; 200 Exchequer, 60 Chicago, 20 1/2; 200 ss. 4d., 100 Emma, 24; 100 Cedar Creek, 11 13s. 9d.; 300 Pacific, 20 1/2; 50 Utah, 11 18s. 8d.; 100 Malabar, 10s. 3d.; 50 Last Chance; 50 40 New Quebrada, 23 1/4; 50 Thornhill Reef, 21 1/2.  
**BUSINESS in Cwm Elan, Tylwydd, Birdseye Creek, and St. Agnes**

20 Roman Gravels, £215½

**V.V. CAMBORNE, CORNWALL**, transacts business in every description of shares at close market prices of the day.



# THE WEST DRAYTON ROLLING MILLS COMPANY (LIMITED).

Incorporated under the Companies Acts, 1862 and 1867, by which the liability of shareholders is limited to the amount of their shares.  
Capital £30,000, in 6000 shares of £5 each,  
Of which 1800 shares, or £9000, are taken by the Vendors in part payment of purchase money.  
Payable—£1 on application; £1 10s. on allotment; £1 10s. and £1 at intervals of two months thereafter. Shareholders can pay up in full, receiving £5 per cent. per annum on the amount pre-paid.

## DIRECTORS.

Capt. F. P. WARREN, R.N., East Court, Cosham, and United Service Club.

J. E. ALLEN, Esq., 5, Prince's Terrace, Bayswater.

WM. FORSYTH BLACK, 117, Cannon-street, E.C., and Past President of Civil and Mechanical Engineers' Society.  
(With power to add to their number.)

## BANKERS.

Messrs. HULL, SMITH, and CO. (The Old Bank), Uxbridge; and their Agents.

Messrs. GLYN, MILLS, CURRIE, and CO., Lombard-street.

## BROKERS.

Messrs. CAMERON and AITKEN, 13 and 14, Cornhill.

## AUDITOR.

A. M. BAKER, Moorgate-street Chambers.

## SOLICITORS.

Messrs. DEAN and TAYLOR, 7, King's-road, Bedford-row.

## SECRETARY.

THOS. R. MANDER, Lincoln Villa, Cowley, Uxbridge.

TEMPORARY OFFICES—7, KING'S ROAD, BEDFORD ROW.

This company is formed for the purchase and working of the Rolling Mills and Works, situate near the West Drayton Station of the Great Western Railway, 13 miles from London.  
The premises, which comprise nearly an acre of ground, with wharfage on the Grand Junction Canal, are held for the residue of a term of which 55 years are unexpired, at a rental of £30 per annum only, and with the plant, machinery, &c., are fully described in the engineer's report, from which it will be seen that upwards of £12,000 has been expended on the plant and machinery, and which, as appears by the Board of Trade Returns for the last six months, could not now be purchased except at an increase of 35½ per cent., attributable to the increased cost of production.

The mills and works were established for the purpose of working up scrap or old iron, of which the supply is practically inexhaustible, and by means of the canal can be brought to the premises at very moderate rates.

The works are at the present time capable of turning out 25 tons of sheets per week, and by additions to the present power of the machinery, occupying less than two months, they will be rendered capable of turning out 35 tons of sheets per week; which would give a return of over £10 per cent. on the capital of the company.

The purchase money for the lease, machinery, plant, &c., is £13,000, of which the vendors take £5000 in cash, and £8000 in shares fully paid-up.

The directors propose to erect at once the guide and merchant mill, now on the premises, and complete the new and powerful machinery commenced by the vendors, at a cost of about £4000. This will occupy from three to four months, and when completed the company will be enabled to turn out from 150 to 160 tons of bar iron per week, by means of which, after making due provision for wear and tear, and renewal and replacement of machinery, plant, &c., a clear total profit of over £20 per cent. per annum on the capital of the company can be obtained.

The directors propose to secure, at an early date, a wharf on the Thames for the receipt of the scrap, and also a warehouse for the manufactured iron.

The directors' fees, salaries, and expenses of management, will not exceed 700l. per annum.

The directors have on hand orders of orders sufficient to occupy the works for upwards of six months after commencing operations.

The only contract entered into on behalf of the company, is one dated 19th July, 1873, made between Frederick George Morton of the one part, and William Forsyth Black, as trustee for the company of the other part.

Copies of the Memorandum and Articles of Association, agreement for purchase, and engineer's reports, may be inspected at the offices of the solicitors to the company.

Should no allotment be made the deposit will be returned in full, but in the event of a less number of shares being allotted than applied for, the surplus paid on application will be applied in reduction of amount payable on allotment.

Prospectuses, &c., with forms of application for shares, can be obtained at the bankers, brokers, solicitors, and offices of the company.

MR. J. H. COLLINS, F.G.S.,

Secretary to the Royal Cornwall Polytechnic Society.

CONSULTING MINING ENGINEER AND ANALYTICAL CHEMIST,

CARTHEW COTTAGE,

BODMIN ROAD, ST. AUSTELL,

AND POLYTECHNIC HALL, FALMOUTH.

THE LONDON AND AUSTRALIAN MINING AGENCY.

MESSRS. C. F. NICHOLLS AND CO. 137, FENCHURCH-

STREET, E.C. AND MELBOURNE, BALLARAT, AND

SANDHURST, VICTORIA, AUSTRALIA.

Our Mr. NICHOLLS having had 20 years practical experience of gold mining in the Colony of Victoria, we have established the above agency for the double purpose of introducing sound mining ventures to English capitalists and the public, and to give such information as to the character of mining properties that may be offered on this market as will indicate their real value and the actual capital necessary to develop and work them, and thus help to protect capitalists and the public from deceptive representations, and vendors from being made the tools of financial agents.

It has been established that the gold mines of Victoria taken in gross pay 20 per cent. per annum on the capital invested, and some of the principal mines from 50 to 400 per cent. per annum. At the development of gold mining in Victoria is only limited by the amount of capital employed, Messrs. NICHOLLS have determined to aid in its introduction.

The mine referred to below is recommended by our firm as a legitimate investment.

C. F. NICHOLLS and CO.

P.S.—Our Mr. NICHOLLS will return to the colony before the end of the year and report regularly to the office. He is willing to attend to any mining commission in the colony.

NORTH HUSTLER'S COMET GOLD MINING COMPANY.

NO LIABILITY.

This company was registered 19th January, 1873, under the provisions of an Act of Parliament of Victoria, Australia, cited as the Mining Companies Act (see Victoria Government Gazette, January 24th, 1873, p. 174), to work a mining concession from the Crown, situated on the northern continuation of the celebrated Hustler's Line of Golden Quartz Reef, Sandhurst. These golden lodes in 1871 and 1872 paid dividends at the rate of 60 per cent. per annum on the total capital of the Great Extended Hustler's and Tribute Companies. A few shares are open for application at a premium of 5 per cent. on the original cost of £1 per share, in lots of not less than five. For particulars apply to

Messrs. NICHOLLS and CO., 137, Fenchurch-street.

Mr. Charles Nicholls, C.M., may be consulted in reference to the character and value of Australian mines between 11 and 4 P.M.

WATTS, RICHARDS, AND CO.

PITWOOD MERCHANTS,

PENNER WHARF, NEWPORT, MONMOUTHSHIRE,

AND 11, BUTE CRESCENT, CARDIFF.

Importers of every description of wood for colliery purposes.

CAPTAIN ABRAHAM FRANCIS,

GOGINAN, ABERYSTWYTH,

MINING AGENT, ENGINEER, AND SURVEYOR.

The great success which is attending the opening and working of the Mines in the counties of Cardigan and Montgomery, and the many properties placed at the disposal of Capt. ABRAHAM FRANCIS, induce him to offer his services either to ADVISE, INSPECT, REPORT, or SURVEY, for Mining Companies or private shareholders.

For terms, apply to Capt. ABRAHAM FRANCIS, as above.

MESSRS. WATSON BROTHERS return their most sincere

thanks for the great patronage bestowed and confidence reposed in their firm for the last 30 years, and to assure their friends and clients it will be their earnest endeavour to merit a continuance of both.

In the year 1843, when Cornish mining was almost unknown to the general public, attention was first called to its advantages, when properly conducted, in the "Compendium of British Mining," commenced in 1837, and published in 1843, by Mr. J. Y. WATSON, F.G.S., author of "Gleanings among Mines and Miners," "Records of Ancient Mining," "Cornish Notes" (first series, 1842), "Cornish Notes" (second series, 1850), "The Progress of Mining," with Statistics of the Mining Interest, annually for 21 years, &c., &c. In the Compendium, published in 1843, Mr. WATSON was the first to recommend the system of a "division of small risks in several mines, ensuring the success in the aggregate," and Messrs. WATSON BROTHERS have always a selected list on hand. Perhaps at no former period in the annals of mining has there been more peculiar need of honest and experienced advice in regard to mines and sharedealing than there is at present; and, from the lengthened experience of Messrs. WATSON BROTHERS, they are emboldened to offer, thus publicly, their best services to all connected with the mining interest.

Messrs. WATSON BROTHERS are daily asked their opinion of particular mines, as well as to recommend mines to invest or speculate in, and they give their advice and recommend mines to the best of their judgment and ability, founded on the best practical advice they can obtain from the mining districts, but they will not be held responsible, nor subject to blame, if results do not always equal the expectations they may have held out in a property so fluctuating as mining.

Although the present depression in English mines (owing in a great measure to the enormous losses incurred by the public in American gold schemes) is very great, perhaps there never was a time when some of them had better prospects of success, or when investors could with greater safety embark in a judicious selection. It was with this feeling that one of our firm, after going to Shropshire and Wales, visited Cornwall. Some of his Notes appeared, under the signature of "Argus," in last week's Journal, and we are now prepared with a selected list of mines, which may, we think, be safely recommended.

MR. R. PERCY ROBERTS,

FINANCIAL AGENT,

60, ENGLISH STREET, CARLISLE

# THE CARACOLAS SILVER MINING COMPANY (LIMITED).

BOLIVIA, SOUTH AMERICA.

Registered under the Companies Acts of 1862 and 1867.

Capital £75,000, in 75,000 shares of £1 each.

The first issue will be limited to 35,000 shares, of which 15,000 are already appropriated in part payment of the property, leaving 20,000 for subscription.

2s. 6d. to be paid on application; 2s. 6d. on allotment; 2s. 6d. on the 1st November, 1873; 2s. 6d. on the 1st February, 1874.

Further calls, if required, to be made at intervals of not less than three months; but subscribers will have the option of paying up their shares in full upon allotment, receiving dividends in proportion.

## DIRECTORS.

T. J. FALLON, Esq., 1, Arundel Gardens, Kensington Park. Late

Deputy Commissioner British Burmah.

WALTER FREETH, Esq., Bedford Park, Croydon. Late Chief

Clerk of the Military Departments, Horse Guards.

JOHN GREENWAY, Esq., 47, Welbeck-street, Cavendish-square,

Late Merchant in Brazil and the River Plate.

Colonel MULOCK, C.B., Junior United Service Club, Pall Mall.

(With power to add to their number.)

Messrs. MASTERMAN, HUGHES, and MASTERMAN, 26, Austinfriars.

## BANKERS.

LONDON AND COUNTY BANK, 21, Lombard-street, London.

(Payments can be made into any of its Branches.)

RESIDENT MINING ENGINEER AT CARACOLAS.

HENRY B. STEVENSON, Esq.

## AUDITORS.

Messrs. F. B. SMART, SNELL, and CO., 55, Cheapside.

SECRETARY (pro tem).—Mr. ARTHUR WALLIS.

OFFICES—No. 8, OLD JEWRY, E.C.

## PROSPECTUS.

This company has been formed for the purchase and working of silver mines in the rich mineral district of Caracolas, situated in the southern part of the Republic of Bolivia, in South America, and at a distance of only 80 miles from the Pacific Coast in a direct line, but between 100 and 150 miles, according to the roads at present used.

The first eight mines opened in that district, and which are called the Descubridoras (or Discoverer's Mines), were discovered less than three years ago, and are giving extraordinary results. According to a statement published in the *Caracolas* of the 28th February, their yield in January last amounted to 82,114 marks (of 8 ozs.), or about £155,000; whilst, according to the *South Pacific Times* of the 28th March, the total yield of the principal mines at Caracolas, including the Descubridoras, in December was 142,796 marks, or at the rate of about £3,500,000 per annum.

These statements are further corroborated by the following paragraph taken from the City Article of the *Times* of the 31st May, 1873:—

"With regard to the silver mines of Caracolas, in the Republic of Bolivia, the following statement appears in the *Valparaiso Journal*, *El Mercurio del Viceroy*, of the 21st ult. The correspondent by whom it is transmitted remarks:—The facts reported may be of interest to show that Bolivia is once more commencing to pour into the world an amount of silver worthy of her old reputation when she gave to Peru her fame as the greatest silver-producing country known."

"The news from Caracolas is good, judging from positive results. According to a correspondent, the quantity of ore deposited in the warehouse of the Descubridoras Mines in a fortnight is not less than 1000 quintals per day, with an average standard of nearly 75 marks per box. This ore belongs almost entirely to the lots got out in February."

The ore delivered from the other mines in the same region has amounted during the fortnight to 8000 quintals, with an average standard of nearly 130 marks per box, received by various purchasing houses.

The quantity of ore now on hand at the different deposits at Antofagasta exceeds 40,000 quintals.

In the course of the present month there will be four Straits steamers coming to embark ore, and an extra one, it is said, chartered by Messrs. Dorado and Volkmar, will take 27,000 quintals."

The ore is at present conveyed to the coast in carts, but a railway is in course of construction from the excellent port of Megillones to Caracolas, under contract between Messrs. Watson and Meigs, of Valparaiso, and the Bolivian Government; and on its completion, which it is expected will take place within two years from this date, the present cost of carriage will be materially reduced, and the value of the mines enormously increased. Another railway is also being constructed from Antofagasta.

The Bolivian Trading Company (Limited), sent out a commission to Bolivia in May, 1872, and the report of their engineer, M. Charles De Bussy, of the Ecole des Mines, Paris (a gentleman of established reputation and extensive experience in the examination of mines in various parts of the world), in respect to twelve of the mines proposed to be purchased by this company, is annexed, and to which the directors invite attention.

These twelve mines were secured by the above-named commission, and placed under the charge of Mr. Henry B. Stevenson, a highly respectable English mining engineer, resident at Caracolas, who reports that under his superintendence the whole of them have been properly measured, the boundary marks prescribed by law set up, and the regulation shafts of four yards in depth sunk on each. He also writes as follows:—"I have bought for your company, the 'Union Huasquina,' 19 2/10ths barras (19 2/10ths of twenty-four shares), and the whole of the mine 'Porvenir.' These two mines are adjoining Claveria's mines, so that your company possess now all the hill, and the addition of these two mines gives much more value to the property, especially the acquisition of the 'Union Huasquina,' which is, in my opinion, the best lot of all."

The whole of the foregoing mines will be transferred to this company for the sum of £5500 in cash and £15,000 in fully paid-up shares.

The first issue of shares, including those appropriated in part payment of the properties, is limited to 35,000. It is expected that the 20,000 shares now offered for subscription will provide, after payment of the purchase-money, amply sufficient working capital for developing the mines, so as to return handsome dividends.

As the ores are spalled and picked by hand, and no pumping has yet been found required in any of the mines worked at Caracolas, no costly machinery will be required.

The preliminary expenses of the formation of the company are defrayed by the vendor.

The agreement between the company and Mr. Joseph Williams, dated 12th July, 1873, for the purchase of the properties, and copy of map showing the different silver lodes at Caracolas, may be inspected, and copies of the Memorandum and Articles of Association may be obtained at the offices of the company.

Applications for shares to be made on the accompanying form, with a remittance of 2s. 6d. per share to the bankers, or to the secretary of the company; if no allotment is made, the money deposited will be returned without deduction.

To the Directors of the CARACOLAS SILVER MINING COMPANY (Limited).

Paris, April 7th, 1873.

GENTLEMEN,—I beg to acquaint you that, in compliance with instructions received from the Chief of a Commission sent out to Bolivia by the "Bolivian Trading Company" (Limited), in May, 1872, I examined 17 claims, constituting 12 silver mines, belonging to Don Marcelino Claveria (manager of the now celebrated Niza Mine), in the north of the second Caracolas district, viz.:—

The "San Juan Bautista," stated to occupy a space of 190 "varas" (2 ft. 9 in.) length by 40 in. breadth.

The "Mapocho" ditto ditto ditto ditto ditto

The "San Antonio del Desierto" ditto ditto ditto ditto ditto

The "Primitiva" ditto 60 varas by 30, to the West of the "Union Huasquina."

The "Eloisa" ditto ditto ditto ditto ditto

The "San Vicente" ditto ditto ditto ditto ditto

The "San Ignacio" ditto ditto ditto ditto ditto

The "General Lasterria" ditto ditto ditto ditto ditto

The "Hermosa Peterquina" ditto ditto ditto ditto ditto

The "Hermosa Vallarta" ditto ditto ditto ditto ditto

The "Sucre" ditto 190 yards by 40.

The "Washington" ditto ditto

I found these mines to be situated on five well-defined lodes, and although no work of any extent had yet been done upon them, the indications of ore were good, and I should consider them to offer as fair a prospect as any other mines in a similar state.

The shares of all the productive mines at Caracolas are quoted at very high prices; thus, those of the "Descada" were being quoted at £200,000, making for the twenty-four shares, or for the whole mine, £4,800,000, almost one million sterling. Other mines where ore had been laid open, but which were not yet paying cost, had equally risen in price. I, therefore, consider that there is no good opening for adventure in the purchase of mines which have been laid open to the above extent owing to the enormous prices asked for them; but there are a good number of promising claims in the hands of the people, who do not possess the means of opening them properly, so that by going to work prudently and seizing opportunities much valuable property can be secured, and of this description I consider Mr. Claveria's mines to be.

They are in a very accessible situation, and the ore can be conveyed in carts along a level road to the railway, when finished, or in the meantime to the establishments which purchase ore on the spot.

C. DE BUSSY.

## FORM OF APPLICATION FOR SHARES.

(To be retained by the bankers.)

GENTLEMEN,—Having paid to your bankers the sum of £ , being 2s. 6d. per share deposited on this my application for shares of £1 each of The Caracolas Silver Mining Company (Limited), I request you to allot me that number of shares; and I hereby agree to accept the same or any less number that you may allot to me, and to pay the balance in respect of the shares allotted.

Name in full

Address

Profession (if any)

Date ..... 1873 Signature

Form to be signed by an applicant desiring to pay up his shares in full upon allotment.

I desire to pay up my shares in full upon allotment.

THE CARACOLAS SILVER MINING COMPANY (Limited).

BANKERS' REPORT.

(To be signed by bankers and retained by applicant.)

Received of the sum of Pounds, being 2s. 6d. per share deposited on application for shares of £1 each, of The Caracolas Silver Mining Company (Limited).

For

\* A quintal=100 lbs. A mark=8 ozs., value £2, at 2s. per ounce. A box (cajon)=64 quintals; 27,000 quintals averaging 150 marks per box=£108,720.

# LONDON AND COUNTY BANKING COMPANY.

ESTABLISHED 1836.

Subscribed capital £3,000,000, in 60,000 shares of £50 each.

Paid-up capital £1,196,880

Installments unpaid £1,200,000

Reserve fund (paid up) 508,440

Installments unpaid 1,560 000,000

DIRECTORS.

NATHANIEL ALEXANDER, Esq.

THOS. TYRINGHAM BERNARD, Esq.

THOMAS STOCK COVIE, Esq.

FREDERICK FRANCIS, Esq.

FREDERICK HARRISON, Esq.

WILLIAM CHAMPION JONES, Esq.

EDWARD HARBORD LUSHINGTON, Esq.

JOINT GENERAL MANAGERS.

William McKewan, Esq., and Whitbread Thomson, Esq.

CHIEF INSPECTOR—W. J. Norfolk, Esq.

CHIEF ACCOUNTANT—James Gray, Esq.

SECRETARY—George Gough, Esq.

HEAD OFFICE—21, LOMBARD STREET.

MANAGER—Whitbread Thomson, Esq.

ASSISTANT MANAGER—William Howard, Esq.

At the HALF-YEARLY GENERAL MEETING of the proprietors, HELD on THURSDAY, the 7th August, 1873, at the City Terminus Hotel, Cannon-street Station, the following report for the half-year ending the 30th June, 1873, was read by the Secretary.

FREDERICK FRANCIS, Esq., in the chair.

The directors, in presenting to the proprietors the balance-sheet of the Bank for the half-year ending the 30th of June last, have the satisfaction to report that, after paying interest to customers and all charges, allowing for rebate and making provision for bad and doubtful debts, the net profits amount to £19,461 9s. 5d. This sum added to £14,936 8s. brought forward from the last account, and £241 13s. 4d. reserved to meet interest accrued on new shares, produce a total of £24,639 10s. 9d. They have declared the usual dividend of 6 per cent. with a bonus of 4 per cent. for the half-year, free of income tax, being at the rate of 20 per cent. per annum, which will absorb £100,000 and leave £4750 to meet the interest accrued on the new shares from the respective dates of payment to the 30th of June last, and £20,189 10s. 9d. to be carried forward to profit and loss new account.

The shareholders having at the meeting in August last decided to issue the remainder of the shares created in 1866, the directors, in view of the continued increase in the business of the Bank, and of the desirability of preserving a proper relation between its capital and the amount of such business, will ask the shareholders to pass the resolution of which notice has been given, authorising the creation of 15,000 additional shares, such shares to be issued at such times and on such terms as may be determined at some future annual or half-yearly general meeting.

The directors will further propose the second resolution contained in the notice, that the Bank be registered under "The Companies Act, 1862," as an unlimited company; this registration, while it will not affect the principle of unlimited liability of shareholders, or involve any alteration in the Deed of Settlement of the Bank, will have the effect, under the terms of the Act referred to, of limiting the duration of liability of shareholders ceasing to be such to one year, instead of to three years as at present











## Mining Correspondence.

## BRITISH MINES.

**ABERDAUNTON.**—S. Toy, Aug. 6: The 10, east of Hill's cross-cut, is without the slightest alteration since last report. The ground continues favourable for progress, and of a very promising appearance for lead. The west end at present contains more spar, and is harder for driving, but of a kindly appearance. The stope in the bottom of intermediate level No. 1 is not so good as last week, now worth for lead 10¢ per fathom. No. 2 stope, in back of this level, continues the same as last week, worth for lead 15¢ per fathom. The 21 tons of lead sold on July 25 weighed a little over. The amount of sale is 328¢. We are raising from the stopes, and dressing as fast as we can towards getting another parcel.

**ABERYSTWYTH.**—John Trevelthick, Aug. 5: Penrhyn: The engine shaftmen have completed the preparatory pitwork and waiting the delivery of the new pumps; we have put them to continue sinking the winze under the 30, at Bwlch Gwyn, where we have a strong lode, and producing from 15 to 20 cwt. of lead ore to the fathom. The lode in the 40 end, immediately under the said winze, is similar in yield and character. The 21 ton pitwork has been completed, and a considerable improvement. We shall resume the sinking with all dispatch in a few days, as I have received notice of the castings being ready. We are making fair progress with dressing and other surface work, and our ponds are well supplied with water.

**ASHLETON.**—M. Whitford, W. Tipton, Aug. 6: The Mawr shaft is now down 10 fms. below the 30; we shall now sink a few feet for a fork, after which the driving of the 40, both east and west, will be urgent on. In the 30 end west since our last we have met with a joint which has disordered the lode, but to-day it is showing signs of improvement. More particulars in our next. No particular change in the various other bargains throughout the mine. Dressing is being urged on with all speed. The machinery, &c., all in good working order.

**BALLYCUMMISK.**—Capt. Daniels, Aug. 1: Underground Operations: During the past week the men in the 222 have made favourable progress. The men in the cross-cut from Carroll's winze have made but slow progress, and the end is very light for working. The stopes over the 210 continue fair average stuff with ore. The end in the 198 has no improvement to note as yet. The stopes over this level are looking well, and yielding good ore, especially Nos. 1, 2, 5 and 6. The winze under this level still continues to sink through good copper ground; the bottom of the winze is looking well with ore, which is a good indication. The stopes over the 186 are much the same as last report.—Surface Operations: The dressing with machinery and all the surface works continue to work well, and are in good working condition up to the present time.—Cooheen—Underground Operations: I have commenced to draw stuff in the diagonal shaft, and I hope by next week to be able to dress some ore again. The stope over the 56 is much the same as when last reported on. The men engaged in clearing up the engine-shaft and repairing the same are getting on fairly.—Surface Operations: The machinery continues to work very well.

**BAMPFLYDE.**—S. Mitchell, Aug. 5: The stope in the 112, west of No. 4 shaft, will turn out 3 tons of rich copper ore per fathom; the lode is 8 feet wide, with numerous branches of variegated and yellow copper ore throughout. No. 1 stope in back of the 102, west of No. 4 shaft, is worth 4 tons of ore per fathom, of the same character. No. 2 stope, in back of same level, will also yield of this ore 4 tons per fathom. No. 3, on new stope, west of cross-course, in back of same level, is now worth 4½ tons of ore per fathom. The stope in the 99, at the end of the winze below the 99, and still further west of the before-mentioned stope, is now worth fully 5 tons of this copper ore per fathom. The winze sinking below the 70, east of shaft, will turn out 1 ton of ore per fathom. We have intercepted a cross-course in the 80 driving east, but cannot say whether it is the main one. I am told that a good lode is gone down in the 58 fm. level before this end. I have now from 400 to 500 skips of ore work underground ready to be drawn to the surface; this will be in addition to the large quantity of copper ore already on the floors, and the 70 tons of dressed ore at our shipping stores at Bant. pit.—Iron Department: No. 2, at Stowford, will turn out 8 tons of good quality ore per fathom; this is on the north part; the south end is 7 feet wide, but at present is not quite so good. The No. 3 lode is occasionally subject to changes. Slader's lode is looking splendid, and is 9 feet wide, solid ore of the highest percentage; there is scarcely a particle of waste in it, and the lode will turn out fully 30 tons of iron ore per fathom. I can now see my way clear to drive a lobby or day level into this lode for the twofold purpose of draining it, and for the economical discharge of the ore, at the same time it would give us backs on the lode for 35 fms. high for about two miles in length, and from present appearances this lode alone (being one out of nine or ten lodes traversing the property) will yield ample ore for one mining ordinary undertaking. The four points of operation carried on the lodes at Crabtree will yield respectively 10 tons of ore per fathom.

**BEDFORD CONSOLS.**—G. Rowe, J. Mitchell, Aug. 6: During the past week we have been visited by a delegation of gentlemen from London, who thoroughly inspected the workings, particularly the new discovery of ore in the winze recently started in the bottom of the 67 fathom level, where the lode is going down to the bottom of the mine 9 ft. wide, of a most promising character, yielding a quantity of sulphur muffle and rich quality copper ore, to the value of 15¢ per fathom, and showing indications of improvement as depth is obtained. The lode in the 57 fm. level end is cut into 4 ft., not through it, of a most flattering appearance, being charged with very strong muffle and peach, accompanied with fine stones of tin and good quality yellow-coated copper ore.

**BEDFORD UNITED.**—William Phillips, Aug. 7: The shaftmen are engaged sinking the engine-shaft and cutting trip-lift under the 115. Driving by the side of the lode is continued in the 115 west. The outward appearance of the lode is very promising. In the 103 west the lode is from 3 to 4 ft. wide, producing 6 tons of ore per fm. a fine looking lode. We continue to drive by the side of the lode in the different other levels of the mine.

**BEISTONE.**—James Neill, Aug. 2: A shaft: Fair progress has been made this week in sinking. There is no change in the character of the ground; depth sunk 1 ft. 7 in.—C shaft, 50 fm. Level East: The character of the part of the lode carried is much the same as named in my last report: spots of arsenical muffle and yellow copper ore are thickly disseminated throughout the end; water is issuing freely, which indicates our approach to the cross-course.—Intermediate Level: The stope from the rise between Nos. 1 and 2 cross-courses are yielding good veins of black ore. The ground is all that can be desired in the lode for the production of copper ore. After a few weeks' opening out of the stopes I have no doubt our raising of ore will be materially increased; at all events, everything tends to warrant it. There is no change to report on any of the other stopes being worked.

**BLAKE.**—W. H. Tregoning, Aug. 6: The old shaft was forked dry to the bottom on Sunday last, but we cannot yet carry a lighted candle down as far as the 10 fm. level, in consequence of an air-pass leading from the sole of the adit level, through the stopes to the 10 fm. level, having become choked. This was caused by the water in the mine disturbing the loose ground, which, as we drained it, filled the pass. This we are now clearing and re-securing, and I expect to get it all right, and the mine thoroughly ventilated, by Friday next. We are pushing on with the entrance of the level to the south of the river as fast as we can, but not as fast as I should wish, as we have not as yet many men at work, and I am obliged to stop and wait for the men to be sent in from getting the old mine in order.

**BLUE HILLS.**—S. Bennett, A. Gripe, Aug. 1: We are pleased to be able to inform you that the 66 east end, on the Pink lode, continues gradually to improve; it is now worth for tin from 10¢ to 12¢ per fathom, with plenty of copper ore throughout the whole width (3 ft.) of the lode—altogether a most promising end, and is now well ventilated. The Wheal Betsy lode, in the 13, east of Joy shaft, is still small and unproductive. The stopes on this lode above are worth respectively 7 and 8¢ per fathom. The various tribute pitches are without much change.

**BLUES.**—W. T. Harnwell, Aug. 6: We have completed cutting ground for the 1002.—W. T. Harnwell, Aug. 6: We have completed cutting ground for the 1002, and the fixing same in a forward position for connecting to the bob, and with good speed we hope to finish this work by the middle of next week. In the cross cut driving north at the 130 west we have intersected a nice branch of blende and lead about 1 ft. wide, but believing there is yet something better ahead the cross-cut is being continued. In the tribute department there is no change.

**BRYNAMBOR.**—George Spargo, Aug. 6: The lode in the 32 east continues much the same in appearance as for some time past, but an improvement will speedily be made. We have been mining a very rich lode in the 32 east, and the branches of lead intersected in the 22 and 12. The lode in the 32 west has considerably improved since my last, and is also letting down more water. Judging from present appearances a further improvement is close at hand. The stope in the back of the 22 is much the same as previously reported. I intend sampling a parcel of lead next week. Surface operations are proceeding as fast as possible.

**BRYN.**—M. Rickard, R. Tregoning, Aug. 6: The lode in the level east, on south lode, is yielding some rich tinstone, and more especially in the bottom of the level: it is more than ever certain that tin will be found in much larger quantities at a deeper point. The erection of flat-rods and dropping of pitwork are being proceeded with, and no time will be lost in putting the shaft down to the 12 ft. level, when from indications at our present depth rich deposits of tin will be met with. The trial working on the south elvan is very satisfactory, and will leave excellent profits on the working by water-power. No particular change to notice in any other part of the mine.

**BUDNICK CONSOLS.**—Aug. 6: Since my last report satisfactory progress has been made. In driving west we have broken some splendid stones of tin. The part we are now driving is very promising ground, full of branches, with every prospect of a great improvement very shortly.

**BURROW AND BUTSON.**—John Christophers, Jas. Mayne, Aug. 6: You will be pleased to hear that our main engine shaft is cleared up down to the back of the 50 fm. level, and that the ground about it is throughout perfectly sound. The men are doing excellent work, and we hope to see the level dry in about a week, which will be fully five weeks sooner than was promised on the 1st ult. We have two men clearing the adit level west for laying down the launders and tanks for scrap-iron to collect precipitate of copper. In the 20 fm. level, east of Tonkins' shaft, we have been mining a very rich lode, and expect we are near the old end. In the back the lode is worth 2 tons of blende per fathom, or the width of the stope. We have four men about 4 fms. west of Tonkins' shaft stopping in the lode, producing about 2½ tons of blende and copper ore, with good stones of lead parallel to it. We have four more men stopping on tribute in the same level; lode producing 3 tons of blende and ½ ton of lead per fathom. We have, further, two men stopping in the back, where the lode produces 2½ tons of blende per fathom. We have also two men stopping in the back of this level, west of engine-shaft cross-cut, on tribute of 8¢ per ton (or about 8¢ in 1¢) for lead. The 30 fm. level we are driving east with six men, to get under Tonkins shaft, which is a very important

point. We have about 8 fms. more to drive to accomplish this, which will give us the advantage of a second shaft to the 30 fm. level, where we have plenty of ore ground. On the dressing floor we are hurrying on the necessary improvements with all possible speed.

**CAEGYNON.**—T. Hodge, Aug. 6: I see no change in either of the bargains worthy of any notice since my last. Saturday next is our pay and setting, which I will furnish you with a full report.

**CAPE CORNWALL.**—R. Pryor, J. Davey, Aug. 5: The lode in the rise above the 100 is 2 ft. wide, and continues to improve in appearance. The ground in the 100 fm. level cross cut is without change, and there is no further alteration throughout the mine worthy of remark.

**CAPPAGH.**—W. Thomas, Aug. 4: The men in the skip-shaft are making fair progress in sinking under the 115 fm. level. No alteration in any other places since last week. All the machinery in good order.

**CARN CAMBORENE.**—G. Rowe, W. Penberthy, Aug. 4: The lode in the 95 fm. level, east from the north winze, is 6 ft. wide, worth for tin and copper 40¢ per fm., and showing indications of further improvement. The drage work from the engine-shaft, at the 95, is slow of progress, and unproductive. All other points are without change.

**CATREDRAL.**—Joseph Mitchell, Aug. 7: It affords me very great pleasure indeed to inform you that the lode in Colonel's engine-shaft has considerably improved since my last report, and we believe that we are very near a rich course of copper ore: in fact, when comparing this fine lode, which is 3 ft. wide, and composed of gossan, prair, and rich black and yellow copper ore, with the lodes in the immediate neighbourhood, I have no hesitation in stating that this mine will turn out a great success, and in a very short time such statement will be verified by the sales of copper and tin that will be made. Doctor's lode continues to produce very rich work for tin and copper.

**CATHERINE AND JANE.**—G. Williams, Aug. 7: Penrhynendraith: In a few days we shall have all the machinery fixed and ready to finish dressing the ore. The lead in the forebrest of the 80 yard level is improving as we drive towards the large lode in the stope. We are driving easterly in the trench, and the lode continues to yield just the same. All works well at surface and underground, and we have abundance of water for all operations. Everything is going on satisfactorily, and our prospects are good.

**CENTRAL VAN.**—James Martin, Aug. 7: We have completed the new lift on Friday last, and I hope we shall make good progress in sinking to the important point. Shaft let to nine men, 10 fms. stent, at 17¢ per fm. The shaft is composed of quartz, carbonate of lime, and good strong feeders of lead from the lode side of the shaft. The engine and pitwork are in good working order.

**COURT GRANGE.**—J. G. Green, Aug. 6: The shallow adit has been re-set since last report to four men, at 115¢ per fm., to hole to Broghin shaft, the men having driven their stent. The lode continues strong and well made up, yielding good stones of silver-lead ore, specimens of which are forwarded you by rail. The recent heavy rains having abated, progress is facilitated in the shaft, less trouble being experienced on account of water. Occasionally good spots of ore are met with in sinking, but at the present shallow depth the ground is not sufficiently settled to lead us to expect lead in paying quantities. We anticipate making the communication in the course of a fortnight, when a great proportion of the present feed, in fact, all the surface water, will be drawn off by the adit. A portion of the lobby to collar laundries of lift (old engine-shaft) has been re-built, almost all the necessary clearing work for that purpose having been done. All the castings for the 30 feet water-wheel are now on the mine, the carpenters are busily engaged with the woodwork, while progress is being made with the excavations for wheel-pit and lobby, so that no time is being lost in this department of the surface work. The repairing of the old pumping wheel pit is proceeding satisfactorily. The new water-course to Broghin wheel, has, with the exception of a small portion which is now being laid out, been brought to the site of the laundries for the wheel. All possible energy is brought to bear on every point, and, on the whole, good progress is making.

**CREVER AND WHEEL ABRAHAM UNITED.**—W. Kitto, J. Vivian, W. J. Paul, Aug. 6: Sturt's Engine-Shaft: Sinking below the 215 the lode is 15 in. wide, improving, now producing good stones of copper ore. In the 215 end west the lode is 1 foot wide, having a kindly appearance. We have commenced to sink a winze in the bottom of the 203, about 14 fms. to the west of the present end in the 215 in. good lode of copper ore, and will give its value in our next advice.—Cromer Shaft: In the rise in the back of the 160 east the lode is 1 foot wide, unproductive. In the 130 end east the lode is from 4 to 5 feet wide, composed of spar, peach, muffle, spots of tin, and copper, &c.—St. George's Shaft: In the 203 end west the lode is improving, now yielding from 3 to 4 tons of good copper ore per fm., and likely to further improve.—Woolf's Man-Engine Shaft: The men are making fair progress in sinking below the 190. In the 120 cross-cut south the end is letting out more water, and the ground is mineralised.—Felly's Engine Shaft: The sumpmen are prevented from sending down any timber to finish the plankings of the winze shaft, since the accident to the same; some of these men are now engaged at surface work. In the 234 end east the lode is 1½ ft. wide, producing a little tin and copper, nothing to value. In the 234 end west the lode is 3 ft. wide, producing saving work to dress for tin and copper. In the 220 end east the lode is 5 feet wide, yielding from 1 to 2 tons of copper ore and some tinstuff per fm.—Blair's Shaft: In the 220 end west the lode is large, and the part we are driving on is unproductive.—Yeates' Shaft: In the rise above the 95, west of cross-cut, the lode is 1 foot wide, yielding spots of tin and copper. We sold yesterday 101 tons 8 cwt. of tin stuff, which realised 284. 4s. 2d., being an average of 2¢ 16s. 3d. per ton on the mine. Employed this week on network 85 men and boys, tribute 4s. 7s. total 173.

**CWM DWYFOR (Copper and Silver Lead).**—Thomas Conner, Aug. 7: We have the water in fork, and shall resume driving the south cross-cut to intersect the lead lode at once. The lead lode in the west stope has been thrown north 3 ft. by a slide, but I find it maintains its size and character on the back of the slide, and is accompanied by a lode of copper on the north side. We yesterday cut a large vug west of the slant. I was anxious to see more of this lode, as it will be a guide in driving the south cross-cut. We have to-day driven a small portion, and back about 1 ft. further west. I find it is a large mass of gossan, muffle, lead, and copper; the lead keeps on the south side. The lode is bearing more to the south-west than it did east of the slant, therefore I shall not be surprised if we have to drive the cross-cut 2 or 3 fms. further before we cut it. In the east stope the lode produces good lead—I estimate it will yield 2 tons per fathom. The winze is down 3 fms.; the lode is inclining more south than at first, consequently we have to take down the lead, which averages 14 in. wide, and produces fully 3 tons per fm.; this lode has every indication of making a large body of ore in depth. The pumping machinery is working well.

**CWM ELAN.**—W. Goldworthy, Aug. 2: There has been nothing done in the No. 1 stope in the back of the deep adit level, this month; I expect the men will resume working this bargain on Monday next. The 10, west of engine-shaft, is producing saving work for lead and blende ores. In the 10, west of shaft, the lode is looking about the same as last reported on, but we have intersected the eastern cross-course; I cannot say much about this until further extension—more particulars in my next (only two men engaged in this level). The men are making good progress in sinking the engine-shaft. Our machinery altogether works well. We have begun to carry the parcels of lead and blende to Rhayada Railway Station the early part of next week.

**CWM TUDOR.**—E. Williams, Aug. 4: We have intersected the lode this week in this mine. The lode now in the end is 15 in. wide, composed of flocon, carbonate of lime, spar, and blende, with spots of lead and copper, on the whole looking very promising, and much better than I had expected to find it at so shallow a depth, there being only about 5 fms. of back to the present end, and I have no doubt in driving west, when a good back will be speedily gained, that a good mine will be opened up. We have more than half a mile on the course of the lode in our set before it enters from Byr, on the west of us.

**DEER PARK.**—John Goldworthy, John Bucknell, Aug. 2: In the adit, or 40, driving west the men are still engaged in driving by the side of the lode, as it is easier for progress. The stratum is a fine light blue clay-slate, highly congenial for the production of tin and copper ore. There is no other change this week.

**DENBIGHSHIRE CONSOLIDATED.**—John Pryor, Aug. 7: Since the meeting we have been busy with fixing connections to new boiler, and clearing of tin stuff, and the fixing same in a forward position for connecting to the bob, and with good speed we hope to finish this work by the middle of next week. In the cross cut driving north at the 130 west we have intersected a nice branch of blende and lead about 1 ft. wide, but believing there is yet something better ahead the cross-cut is being continued. In the tribute department there is no change.

**DE BROKE.**—W. Michell, jun., July 30: Setting Report: The rise in the back of the 25, east of No. 1 shaft, is re-set to six men, at 220¢ per fathom; the lode still worth 10 cwt. of lead ore per fathom. No. 2 shaft to sink by six men, at 280¢ per fathom; we have not been able to sink as speedily as we expected in consequence of the late floods; we have had a great deal of surface water to contend with. The south part of the lode as taken down in the shaft for 1 ft. wide is poor, but we can now see by the rise that the main part is standing on the north side of the shaft. The 25, to drive west of No. 3 shaft, on the main lode, to six men, at 230¢ per fathom; the part of the lode taken down in the level for 2 ft. wide is composed of clay-slate and spar, with occasional spots of lead ore, but not sufficient to value; but we are still leaving a strong lode standing on the north side. Our machinery is all working well.

**DRAKE WALLS.**—William Skeewis, E. Dunstan, August 6: In the 30, west of Brenton's shaft, we have 17 men working on tribute, who are all getting good wages. Here we have a large lode standing in whole ground from this level to surface. We have also four men who have taken a pitch at the adit level to drive and stoppe backs, at 10s. in 1¢. There are 30 fathoms of backs here, and standing whole to surface—a mine of itself. All other parts of the mine are without any alteration to notice. The pumping engine continues working quite satisfactorily, and the water is in fork 9½ fms. below the 40. We are raising throughout the mine a sufficient quantity of stuff for the stamps, and find the work to be yielding tin of a fair average quality, and shall soon have a good batch of tin ready for the market.

**DYLIFFE.**—E. Evans, Aug. 7: Dylliffe Lode: We have communicated the 93 with 105, and are in a position to put 20 men to work on this excellent course of ore ground, at which 15 men have been put on already. I expect at the beginning of next week we shall be able to increase the dressing to the rate of 100 tons per month. The 15, east of old engine shaft, is driven in a very promising lode, worth 6 cwt. of lead ore per fathom. This end is about 40 fms. short of being under the rich ore ground seen in the adit level above, but from the present appearance of the lode I am led to believe that we shall meet with it at a shorter distance.—Es-gair-galed Lode: The 35, west of tinze, is still looking very promising for opening out new sections to the west of the lode to the west of our present workings, it being now worth 2 tons of lead ore per fathom. No change worthy of remark in any other portion of the mine.

**EAST BALLESWIDEN.**—T. Trahair, Aug. 6: The mine is forked 7 fathoms under the 40 fm. level, the appearance of the lode is much the same as when last reported; we have not seen either of the ends at the 40, but hope to do so in a short time. The 30 fm. level, driving west from Morgan's engine-shaft, is opening good tin ground. The tribute pitches are looking well. The next sale of tin will be on the 14th of this month.

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**DRAKE WALLS.**—William Skeewis, E. Dunstan, August 6: In the 30, west of Brenton's shaft, we have 17 men working on tribute, who are all getting good wages. Here we have a large lode standing in whole ground from this level to surface. We have also four men who have taken a pitch at the adit level to drive and stoppe backs, at 10s. in 1¢. There are 30 fathoms of backs here, and standing whole to surface—a mine of itself. All other parts of the mine are without any alteration to notice. The pumping engine continues working quite satisfactorily, and the water is in fork 9½ fms. below the 40. We are raising throughout the mine a sufficient quantity of stuff for the stamps, and find the work to be yielding tin of a fair average quality, and shall soon have a good batch of tin ready for the market.

**DYLIFFE.**—E. Evans, Aug. 7: Dylliffe Lode: We have communicated the 93 with 105, and are in a position to put 20 men to work on this excellent course of ore ground, at which 15 men have been put on already. I expect at the beginning of next week we shall be able to increase the dressing to the rate of 100 tons per month. The 15, east of old engine shaft, is driven in a very promising lode, worth 6 cwt. of lead ore per fathom. This end is about 40 fms. short of being under the rich ore ground seen in the adit level above, but from the present appearance of the lode I am led to believe that we shall meet with it at a shorter distance.—Es-gair-galed Lode: The 35, west of tinze, is still looking very promising for opening out new sections to the west of the lode to the west of our present workings, it being now worth 2 tons of lead ore per fathom. No change worthy of remark in any other portion of the mine.

**EAST BALLESWIDEN.**—T. Trahair, Aug. 6: The mine is forked 7 fathoms under the 40 fm. level, the appearance of the lode is much the same as when last reported; we have not seen either of the ends at the 40, but hope to do so in a short time. The 30 fm. level, driving west from Morgan's engine-shaft, is opening good tin ground. The tribute pitches are looking well. The next sale of tin will be on the 14th of this month.

**ELAN.**—W. Goldworthy, Aug. 2: There has been nothing done in the No. 1 stope in the back of the deep adit level, this month; I expect the men will resume working this bargain on Monday next. The 10, west of engine-shaft, is producing saving work for lead and blende ores. In the 10, west of shaft, the lode is looking about the same as last reported on, but we have intersected the eastern cross-course; I cannot say much about this until further extension—more particulars in my next (only two men engaged in this level). The men are making good progress in sinking the engine-shaft. Our machinery altogether works well. We have begun to carry the parcels of lead and blende to Rhayada Railway Station the early part of next week.

**CWM TUDOR.**—E. Williams, Aug. 4: We have intersected the lode this week in this mine. The lode now in the end is 15 in. wide, composed of flocon, carbonate of lime, spar, and blende, with spots of lead and copper, on the whole looking very promising, and much better than I had expected to find it at so shallow a depth, there being only about 5 fms. of back to the present end, and I have no doubt in driving west, when a good back will be speedily gained, that a good mine will be opened up. We have more than half a mile on the course of the lode in our set before it enters from Byr, on the west of us.

**DEER PARK.**—John Goldworthy, John Bucknell, Aug. 2: In the adit, or 40, driving west the men are still engaged in driving by the side of the lode, as it is easier for progress. The stratum is a fine light blue clay-slate, highly congenial for the production of tin and copper ore. There is no other change this week.

**DENBIGHSHIRE CONSOLIDATED.**—John Pryor, Aug. 7: Since the meeting we have been busy with fixing connections to new boiler, and clearing of tin stuff, and the fixing same in a forward position for connecting to the bob, and with good speed we hope to finish this work by the middle of next week. In the cross cut driving north at the 130 west we have intersected a nice branch of blende and lead about 1 ft. wide, but believing there is yet something better ahead the cross-cut is being continued. In the tribute department there is no change.

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With this week's Journal an enlarged SUPPLEMENTAL SHEET is given, which contains: Mr. Hemmon's Prize Essays on the Prevention of Colliery Accidents—Nova Scotia Gold Region, No. II.—Foreign Mining and Metallurgy—Doncaster Coal Field, and its alleged Continuation—Copper, Tin, and Coal Trade—Australian Mines Reports—Patent Matters—Meetings of the London and County Bank, Falcon Cliff, Glen Severn, Tankerville, Cornwall Minerals Railway, Australian United, Roca Gold Washing, Azof Coal, Bonville's Court Coal and Iron, Cappagh, and Dolcoath Companies—Original Correspondence: Mining in Colorado, Zeno Enquiry—Dol (W. White); Colliers' Strike in Shropshire; Iron Trade; "Cambrian Metallurgy, No. III." (S. Evans); One Dressed by Sea Water; Mining in North Wales, and its Prospects, No. III. (R. Knapp); Mining in Montgomeryshire; Improvements in Lead Dressing—Rhosyddal Mine (S. Y. Dunn); Mining, and Mining Finance (R. Tredinnick); Speculating in Foreign Mining Shares; Bensus Mining Company; Bronlloyd Mine, and its Management (T. Kemp); Mine Brokers: Change in Time, &c.

**TANKERVILLE.**—The report from the manager, Capt. A. Waters, presented to the annual general meeting, on Tuesday, is the best that has yet been written on this wonderful mine. It will be found at length, with the proceedings of the meeting, in another column. The heavy work of completing the shaft to the bottom (140 fms. under adit) has been accomplished, and the returns will now be 150 tons a month, with a gradual increase, yielding large profits. Within the next four months several of the side lodes will be cut, and they will give considerable further returns, augmenting also the profits. The mine is now in a position to be extensively worked, and is evidently at the beginning of a very prosperous career.

**BOSCAWELL DOWNS.—NEW MODE OF PAYING MINE AGENTS.**—A marked improvement in this property is reported; and it is now confidently felt the company will quickly reap the reward to which the expense they have incurred in putting the mine in thorough order entitles them. A new arrangement, which promises to work very satisfactorily, has been introduced in the payment of the underground agent—a premium is given to all tin returned above the average. Mr. James T. Keven, of Penzance, banker, has joined the board of direction. Messrs. Robey and Co.'s portable engines are working admirably.

**WEST DOLCOATH.**—The law's delay can scarcely be more glaringly displayed than in the instance of this mine's prosperity. It would have been scarcely credited outside legal circles that it was necessary that 12 months should be occupied in the process of the renewal of a lease, especially where the lessor was a person for whom the Lord Chancellor and the representative, the proprietor being a lunatic. The plain statement will account for the apparent neglect in prosecuting this well-known and deservedly highly-estimated property. For the reasons stated the efforts of the directors and all concerned were paralysed, and any attempt at working the mines would have been nugatory. Now, however, these hindrances have been overcome the mine will shortly be set out, and wrought under able management and adequate capital. From its position it has been long regarded as a favourite spot by experienced miners, no doubt amongst whom exists as to its being shortly a remunerative and valuable mine, which will once more restore the fame of the district (Camborne) in which the West Dolcoath is situated.

**VAN CONSOLS.**—The manager's reports, which appear in this day's Journal, clearly indicate a great future for this mine. The 45 end, one of the pioneer points, contains ore throughout. The 60 is now only 12 fathoms behind the winze gone down in the bottom of the 45, and now worth from 4 to 5 tons of lead per fathom. The 60 is also producing nearly 3 tons of carbonate of barytes per fathom. Capt. Roach writes this week—"The mine never looked more promising than at this time." The sound financial position of this company is a feature of considerable importance.

**COURT GRANGE.**—The news from this mine is indeed very encouraging; it clearly shows that the mine is steadily improving as the explorations are being carried on. The agent reports that a strong lode is now being worked upon, producing some good lead ore, very rich in silver. Some of the specimens from the lode referred to in the agent's report, which are very fine, have been sent up to the London office.

**SUCCESS, RUSHY CLIFF, AND NANCY CONSOLS.**—These mines, from the progress made, and satisfactory appearances of the different veins at all points, certainly indicate that at no very distant period they will become highly valuable and good paying mines. They are now being prosecuted with great vigour and determination by the present enterprising proprietors, who deserve the thanks of the whole mining community for being the first in the vein in exploring this part of the old and rich lead mining district, and thus paving the way for a future great extension of mining enterprise in this fine old lead-bearing county. All the shares in these mines have been allotted, but the directors have come to the determination to issue a limited number at a premium.

**ST. AGNES CONSOLS.**—It is probable that in driving north at the 45 the main part of the Wheal Rock lode will be met with, and, in the meantime, the shaft will be got down with all possible dispatch, and the ends which look so well at the 35 pushed forward. This mine undoubtedly has a great future before it, and the shares deserve attention.

**MESSRS. CAMERON AND CO., FINANCIAL AGENTS AND SHARE BROKERS, BRIDGE STREET CHAMBERS, CHESTER.**

**MESSRS. ENDEAN AND CO. STOCK AND SHARE DEALERS, 25, GRACECHURCH STREET, LONDON, E.C.** Capitalists and investors will find through us the best and safest medium for genuine information and advice touching all kinds of Stocks and Shares, British or Foreign, together with the purchase or sale of them. All marketable securities of the Bank of England, the Bank of Scotland, the Bank of Ireland, and the Bank of America, these cannot fail to have a great value in the market.

**BAMFYLDE.**—This extraordinary and valuable mineral investment is one of an exceptional character, scarcely paralleled in the annals of mining. Within two years of the company's operations they have been enabled to pay an interim dividend for the six months of £3000, being at the rate of 20 per cent. on the company's capital; and it is believed that the next dividend will equal three times that amount. Their copper ore is of the richest quality, usually realising about £17 per ton. They have now at the stores for shipment at Barnstaple about 70 tons of copper ore, and about 250 tons on the floors of the mine, 150 tons of manganese, and about 5000 tons of iron ore, which is now ready for the market; and the agent's report, in another column in this Journal, will thoroughly substantiate the value and great importance of this mine. He says one point will turn out 3 tons of rich copper ore per fathom, another 4 tons per fathom, and the third 4 tons per fathom, the fourth 4½ tons per fathom, the fifth 1 ton of ore per fathom, the sixth 5 tons per fathom, and there are 500 skips of copper ore work broken underground ready to be drawn to surface. Besides, in the iron department one lode will turn out 8 tons of iron ore per fathom, and another about 5 tons per fathom, and the main lode is 9 ft. wide, solid ore of the highest percentage, and will yield 35 tons of iron ore per fathom. [The agent thinks that this lode of itself is sufficiently valuable for one undertaking.] There are four other lodes, yielding respectively 10 tons of ore per fathom. We really know of no mining property equally worthy of the consideration of the investor as the Bamfylde.

**ABERDAUN.**—This mine is opening up magnificently, and is really showing indications of great prosperity. The lodes are producing fair quantities of lead, and from the Van lode more especially; they have just sold another parcel of lead, and are making preparations for others to follow. The dressing floors are well laid out, reflecting great credit on the manager, Capt. Tye, a man in whom we have confidence, and who over-estimate the value of the property, as we have found the yield of lead from the lodes considerably beyond his estimate. Looking at the mine as it is now opening up, we believe the day is not far distant when it will command a reputation second to no mine in the Van district.

ENDEAN AND CO., 25, GRACECHURCH STREET, E.C.

## THE CASE OF ELIZABETH CORT, WIDOW OF THE LATE RICHARD CORT.

The name of Cort is associated with, and is illustrious for, the inventions which are the foundation of the British Iron Manufacture.

The late Richard Cort was the son of Henry Cort, described in the *Times* of the 29th July, 1856, as the "Father and the Founder of the British Iron Trade, and the 'Tabular Case' of our century and country."

The way in which he was deprived of the fruits of his labours, by the malpractice of Government officials, and by which his family was left in penury, amidst the wealth which he had created for individuals and the nation at large, is matter of history.

The destitute condition of Richard Cort was represented to Lord Palmerston in 1856, and a pension of £100 a year was granted to him, which ceased at his death. It was not continued to his widow, as, relying upon the specific promise of Lord Palmerston to that effect, it was expected it would have been. That widow, the daughter-in-law of the late Henry Cort, is, in her declining years, absolutely destitute; she suffers from chronic bronchitis, rendering her residence in a purer atmosphere than that of the metropolis indispensable.

An appeal is made to all those producers and users of iron and steel who have so largely profited by the inventions of Henry Cort, to provide, during the few remaining years of her life, those necessities which, so far as may be practicable, will tend to alleviate the physical sufferings and state of destitution in which the widow of the late Richard Cort has been left.

This appeal, it is confidently hoped, will not be without good result, especially as the annual amount to be provided need not exceed £120 or £150, a sum so insignificant as not to be felt by any one of those great manufacturers who have been enriched by the inventions of Henry Cort.

Donations or annual subscriptions are asked to be transmitted by cheque, made payable to "Charles Manby (Cort Fund)" or order, and crossed "Union Bank of London," where an account is opened for the "Cort Fund."

LEAD-COL. CHARLES MANBY, C.E., 21, Great George Street, Westminster, London, S.W.,—Treasurer.

John Penn, Esq.,	£100 0 0
Thomas Brassey, Esq.,	100 0 0
Papayanni and Co.,	10 0 0
Bolckow, Vaughan, and Co. (Limited),	10 0 0
Hopkins, Gilkes, and Co.,	5 0 0
Alexander Brodgen, Esq., M.P.,	5 0 0
Charles Attwood, Esq.,	2 0 0
G. B. Bruce, Esq., C.E.,	2 0 0
R. May, Esq., C.E.,	1 0 0
H. W. F. Bolckow, Esq., M.P.,	10 0 0
Isaac Fletcher, Esq., M.P.,	10 0 0
John Lancaster, Esq., M.P.,	10 0 0
Isaac Imrie and Co.,	25 0 0
I have investigated this case, and so far as I see it is a worthy object to be considered by the owners of iron steam ships and sailing vessels.—W. H. Dixon	100 0 0

## The Mining Market: Prices of Metals, Ores, &c.

METAL MARKET—LONDON, AUG. 8, 1873.

COPPER.				IRON.			
Best selected, p. ton	91	0	0-02	0	0	0	0
Tough cake and tile	89	0	0-01	0	0	0	0
Sheeting & sheels	95	0	0-100	0	0	0	0
Old	98	0	0-100	0	0	0	0
Bottoms	98	0	0-100	0	0	0	0
Old	83	0	0-	—	—	—	—
Burra Burra	90	0	0-91	0	0	0	0
Wire	0	1	1½-	0	0	0	0
Tubes	0	1	0½-0	1	1	1	1
BRASS.				STEEL.			
			per lb.				
Sheets			10d.-10½d.				
Wire			10½d.-				
Tubes			11½d.-11½d.				
Yellow metal sheathing			8½d.-9d.				
Sheets			8½d.-8½d.				
SPELTER.				ZINC.			
			per ton.				
Foreign on the spot.	25	0	0-26	0	0	0	0
" to arrive	—	—	—	—	—	—	—
TIN.				LEAD.			
			per box.				
In sheets	32	0	0-32	0	0	0	0
QUICKSILVER (p. bot.)	15	0	0-	—	—	—	—
TIN-PLATES.*				IRON-PLATES.			
IC Charcoal, 1st qual.	£22	0	0-2	0	0	0	0
IX Do., 1st quality	2	0	0-2	0	0	0	0
IX Do., 2d quality	1	18	0-2	0	0	0	0
IX Do., 3d quality	2	3	0-2	0	0	0	0
IX Coke	1	12	6-1	16	0	0	0
IX Ditto	1	18	6-2	2	0	0	0
Canada plates, p. ton	23	0	0-23	0	0	0	0
Ditto, at works	22	0	0-22	0	0	0	0

\* At the works, ls. to ls. 6d. per box less.

Terne-plates 2s. per box below tin-plates of similar brand.

† Add 6s. for each X.

\* At the works, 1s. to 1s. 6d. per box less. † Add 6s. for each X.

**REMARKS.**—The continued cheapness of money, and the removal of apprehensions that the Bank rate might rise as suddenly as it has fallen, and the favourable weather which has for several weeks past been daily improving the prospects of the harvest, these and other causes combined have imparted some measure of firmness to our markets, and as regard certain metals, fractionally higher prices have during the past week been realised. Although easy money will not alone effect any important and permanent resuscitation in business, yet, doubtless, as facilities for financing are afforded, the attention of speculators is turned to those quarters in which a profitable investment may be made, and to all parties a moderate rate of discount presents advantages for extended operations. There are at present no indications of any general revival in the metal trade, and the opinion is firmly adhered to that as Bank rate, and harvest prospects, and other matters which may to a greater or less degree influence the course of our markets, be what they may, nothing short of a reduction in quotations generally, and that in some metals to a considerable extent, will bring about an active demand and a healthy market. The shipping season ought now to be at its height, but orders for shipment between this and the autumn do not come in to the extent that was anticipated, or that could be desired.

**COPPER.**—Throughout the week the market has exhibited firmness, and the amount of business transacted has been somewhat in excess of previous weeks. No decided improvement bearing marks of permanency has as yet become apparent, and until a steady demand for consumption springs up, and the Indian market shows signs of revival, a return to the activity of former times is not to be looked for. It is so far satisfactory that the improvement noted during the last week or two has arisen rather from a better demand for consumption than from an increase in speculation. The position of the market is, to this extent, substantially improved. The values of Chili and Australian produce have been firmly maintained, but English varieties do not find buyers in quantities, except below current quotations. The returns from the Board of Trade of imports and exports for the seven months ending July 31st are as follows:—Imports: Ore, 31,512 tons; regulus, 17,738 tons; wrought and unwrought copper, 20,150 tons; pyrites of iron or copper or sulphur ore, 323,891 tons.—Exports: 1,966 tons copper wrought and unwrought. The following is a recapitulation of the week's business: On Tuesday, 100 tons Urmeneta changed hands at 81½. 75 tons of picked brands from 82½ to 83½; 25 tons Wallaroo, 90½. 10½ and 5 tons ingots, 91½. all on cash terms. The market opened firm next day, and 50 tons Urmeneta sold at an advance of 5s. upon the price of the previous day, 25 tons Lota, 81½. 15 tons Lota, 81½. 15 tons Wallaroo, 90½. 10½, net, sharp cash to usual cash terms. At the Swansea Market, 107½ tons of ore, average produce being 25½ per cent., realised an average of 14s. 9½d. per unit, and Cape ore, 15s. 6½d.; 350 tons Chili ore have been sold at 15s. 6½d. per unit; 25 tons Lota, 80½. 1½ net cash, and an equal quantity 81½. 5s. usual terms; 25 tons Urmeneta, 81½. 10½; 50 tons best brands, 83½; 25 tons Walker, 83½. 7s. 6½; 25 tons Burma, 90½, and 50 tons Wallaroo, 91½, all on cash terms. A small parcel of yellow metal has changed hands at 8½d. per lb. On Thursday, 150 tons Chili regulus realised 15s. 6½d.; 125 tons Lota, 20½. 1½, net to usual cash; 25 tons Urmeneta, 81½. 10½; 50 tons picked brands, 82½ to 83½; 25 tons best brands, 83½. 5s.; 50 tons Burma, 90½; 25 tons Wallaroo, 90½. 15s. net, and 15 tons 91½. 5s. usual cash.

**IRON.**—There has been some variation in the condition of the iron trade in the North of England during the past week, and the tendency has been to greater ease. No. 3 pig-iron has been quoted at about 98s.; No. 4, 85s. The enquiry for iron is limited, No. 3 being rather more in demand than the other qualities. The proposed alteration in the German tariff, which comes into force on October 1, restricts business in that quarter until that date, the reduction of 5s. per ton duty on iron being a matter of important consideration. Another reason which tends to restrict business within narrow limits is the determination exhibited almost universally by buyers not to submit to present prices. The belief is becoming more general that lower quotations will rule ere long, and the fact that those countries which have been in the habit of supplying themselves in the English market are now extending their own works with the view of becoming independent of England, may perhaps be considered an indication, not only that foreign buyers object to pay these high prices, but the trade to which England has considered for years past that she had a prescriptive right is about to leave her shores. If this be so it will prove a far more serious consequence, resulting from the continuance of high prices than all the other inconveniences from which the trade is now suffering. The price of fuel is the great drawback to lower quotations in iron. Coke in the North of England is at this moment about three times the price that it was two years ago. Efforts are being made to increase the output by the opening up of new collieries, but some time must elapse before the effect of this movement is realised. A report similar to that from Middlesbrough has been received from Birmingham, where there is but little business doing in hardware. In proportion to the concession which manufacturers are prepared to make orders are given out, and, doubtless, if an important drop in quotations generally should occur a good business would be done. There is but little to encourage from the advices from South Wales.

For some time past there have been but few enquiries in the market, and but still fewer contracts have been passed, but up to the present time lack of employment has not been seriously felt. A very large number of orders in connection with the railways find their way to South Wales, so that upon contracts booked some time back the rail-mills are well employed, and large shipments continue to be made to the Continent and to Russia. America still continues to hold back orders, and the amount of work in hand for that quarter of the globe is not nearly so large as usual. In South Wales the opinion also prevails that not until lower quotations are published will there be any important resuscitation of business; but the cost of fuel and labour here, too, forms an insuperable bar to a reduction in price.

The Glasgow pig iron market opened on Tuesday last with firmness, and business was transacted from 108s. to 108s. 9d. On Wednesday business was done up to 109s., but the market closed easier, with sellers at 107s. 9d. On Thursday there was a still further drop. At the commencement of the day 107s. 6d. was the quotation, after which the market receded to 106s., and closed at 106s. 6d.

SHIPMENTS.		Tons	14,494
Week ending Aug. 3, 1872			10,187
Week ending Aug. 2, 1873			17,874
Decrease			4,307
Total decrease since Dec. 25, 1872			17,874

**LEAD.**—The market is quiet, but steady. Good soft English pig is quoted 22½. 10s.; LB, 23s.; and there are sellers of Spanish at 22½ to 22½. 5s.

**ZINC.**—There were 120 tons London rolled offered for sale, of which 95 tons have been bought at 30½. 12s. 6d. to 30½. 7s. 6d. The remainder was bought in at 30½. 10s.

**SPELTER.**—The stock of spelter in the Port of London on July 31 was 441 tons. The market is quiet, and prices are for Silesian 25½, and for English Y and S 26½, London.

**TIN.**—The market continues steady. Straits averages 130½ cash, and business has been done for forward delivery as follows:—129½ end of August; 128½ all September, buyers' option. Banca is quoted 133½. Australian ore has realised from 77½. 15s. down to 17½. 17s. 6d. The larger proportion of the 150 tons sold is of the higher quality.

**TIN-PLATES** continue very quiet.

At Swansea Ticketing, on Tuesday, 1976 tons of copper ore were sold, realising 32,745½. 5s. 6d. The particulars of the sale were—Average standard for 9 per cent. produce, 95½. 1s. 6d.; average produce, 22½; average price per ton, 16½. 11s. 5d.; quantity of fine copper, 442 tons 3 cwt. The following are the particulars of the two last sales:—

Date.	Tons.	Standard.	Produce.	Per ton.	Per unit.	Ore.	Produce.
July 8.	1710	98 14	108 14	14 7 4	14 5 4	472	0
Aug 8.	1875	98 14	108 14	14 11 8	14 9	78	18

Compared with the last sale, the advance has been in the standard 17. 7s., and in the price per ton of ore about 6s. On Aug. 19 there will be offered for sale 1362 tons, from the Cape, Berchaven, Lofoten, Italy, Norway, &c.

The MINING SHARE MARKET has been moderately active for some time since our last, and there have also been enquiries—some speculative shares. There seems to be a general impression on the market that there will be, ere long, a sudden and great rebound from the existing depression, and many large speculators are waiting till they think prices have reached their lowest before commencing operations. The general public seldom buy when things are low, but rush in after the excitement has commenced.

The mines chiefly dealt in this week have been Tankerville, West Tankerville, South Roman Gravel, Roman Gravel, Dolcoath, Brea, Wheal Grenville, Cook's Kitchen, Van Consols, Ladywell, Wheal Uny, Rookhope Valley, Pennerley, and a few others; but the most part our quotations may be taken as merely nominal.

Dolcoath, 46 to 48; at the meeting, on Monday, the accounts, which were charged up to July 12, showed—Tin sale (258 tons), 18,990; Cost, 15,423½; leaving balance in hand 3273½, out of which a dividend of 15s. per share was declared, leaving 51½ to be carried forward; the bottom end in the mine, which the agent stated showed signs of exhaustion or decay, is worth 150½ per fm. Bog, 1½ to 1½. 13; East Lovell, 16 to 17; East Van, 4 to 4½; Great Laxey, 16 to 17; Trumpet Consols, 6 to 7; at the meeting the accounts (taking credit for tin sold, 2557½; also for tin unsold, 2200½, and charging costs to May) showed a balance in favour of the mine of 176½. Wheal Basset, 50 to 55; at the meeting, held in Cornwall, on Tuesday, the accounts, charging up the costs to June, only showed a loss on the two months' working of 570½, and an adverse balance of 1988½; the tin sold 50 tons realised 378½; this sale was smaller than usual, owing to a falling off in the stopes in the 65, on the Carbola lode.

Great Wheal Vor, 4 to 4½; Ladywell, 3½ to 4; New Dolcoath, 4 to 5; New Rosewarne, 1½ to 1½; North Treleigh Wood, 2½ to 2½. Old Treburget, preference, 10s. to 15s.; Pennerley, 2 to 2½. Pennerley Consols, 15s. to 20s.; West Jewell, preference, 10s. paid, 1½ to 1½. 16th prem.; West Gurland, 2½ to 3; West Esclair, 1½ to 1½. 13; East Lovell, 16 to 17; East Van, 4 to 4½; Great Laxey, 16 to 17; Trumpet Consols, 6 to 7; at the meeting the accounts (taking credit for tin sold, 2557½; also for tin unsold, 2200½, and charging costs to May) showed a balance in favour of the mine of 176½. Wheal Basset, 50 to 55; at the meeting, held in Cornwall, on Tuesday, the accounts, charging up the costs to June, only showed a loss on the two months' working of 570½, and an adverse balance of 1988½; the tin sold 50 tons realised 378½; this sale was smaller than usual, owing to a falling off in the stopes in the 65, on the Carbola lode.

Tankerville, 11½ to 12; the report presented to the general meeting, on Wednesday, was exceedingly favourable. The directors state that, after paying June cost, the credit balance is 2500. Capt. Waters promises a return of 150 tons a month (which we believe will give a profit of about 1200½), with a gradual increase, and he expects to cut several of the side lodes within four months, from which he believes the returns and profits will be greatly augmented. We must refer to his full report, which, together with the details of the meeting, will be found in another column. West Tankerville, 3½ to 4½; the meeting on Thursday went off well, the report being exceedingly satisfactory. The directors state that they do not consider any more capital will be required from the shareholders, and Capt. Waters promises to begin with 30 tons next month (which will fully pay cost), and increase soon. Full reports and the proceedings of the meeting will appear in the Journal next week. Wheal Grenville, 4½ to 5; Wheal Kitty (St. Agnes), 12½ to 13; Wheal Margaret, 4½ to 5½; Wheal Seton, 37½ to 40; Wheal Day, 3½ to 3½.

Among Foreign Mines Enmas are 4 to 4½; Flagstaff, 9½ to 10½; New Quebrada, 3 to 3½; South Aurora, 4½ to 5; Sweetland Creek, 4½ to 5.

The Market for Mine Shares on the Stock Exchange during the week has been more animated, and prices generally have been maintained.

Some descriptions of American, and also many of the best class of home mines have been in fair demand.

The Metal Market has exhibited a steadier tone throughout the week, and there has been a fair amount of business doing. Copper remains about the same; Australian has been in moderate request, and manufactured also at quotations. In Tin but a small business has been done, with prices steady, Spelter dull, and Lead a shade better.

Flagstaff, 10½ to 10½, ex div.; last week's product realised 6000. Everything is going on in a most satisfactory manner, 100 tons of ore are being hauled daily, and the furnaces and roads in good order. Last Chance, 5½ to 5½, ex div.; the ore is still improving in quantity and quality, and 40 tons of ore are being hauled daily, and is proving much more friable and easier to be worked than first anticipated. Tecoma, 6 to 6½; large bodies of ore and charcoal continue to be accumulated at the smelting-works; the difficulty in regard to the "flux" is now overcome, and the first result is expected to be announced in a few days.

Emma shares have been in exceptional demand, closing 4½ to 4½; private advices have been received that very rich ore is being opened out in the bottom of the shaft, and that the general prospects of the mine are rapidly improving. Utah, 1½ to 1½; a telegram from Mr. Longmaid says that he has successfully started the jiggers, and dressed 10 tons of ore. Chicago, 4 to 4½; a report on this company's works and mine has been received from Mr. S. Prout Newcombe, of Croydon, an English gentleman and shareholder travelling for pleasure in Utah. The report is highly favourable, and will be sent early next week for your use. A telegram received from Mr. Godbe, the manager, this week says the furnaces and wire-tramway are almost completed.

Richmond, 6½ to 6½; the weekly cable is as follows:—\$35,000 five days lost lining furnaces, raising 100 tons of ore daily. Linette tunnel through within a fortnight. As the fourth furnace was not completed the delay for lining was anticipated; that in spite of this the returns should be so large is encouraging. We notice that the directors have declared a dividend of 5s. per share. The circular to the shareholders points to the fact that the monthly profits are now over 11,000½, and that large profits may be expected before the end of the year. We understand that the directors have paid off a large sum from the loan account, reducing that to about 20,000. As the heavy law costs of the late suit are all settled, and the greater portion of the purchase-money paid off the recent acquisition, the large monthly earnings warrant the anticipation, if not of monthly dividends, of regular quarterly payments to the shareholders. We hope to be able in our next to give an abstract of Mr. Clarence King's masterly evidence respecting the character and bearing of the Richmond Mine, as given by him in the recent suit before the Court at Eureka. Eberhardt, 5½ to 5½; 1050 tons of ore were crushed in July, of the average assay of 357; the value of the produce was 9000½, and expenses (including 990½ towards construction of new mill), 75,000½, leaving a net profit of 2400½; the mines continue to look well. South Aurora, 17s. 6d. to 19s. 6d. Pacific, 4½ to 4½; a meeting has been called to wind-up the company. It seems a pity that the shareholders did not respond, so as to enable the executive to pay off the small amount (only 2000½) owing by the company.

There has



**BURNING COAL BEDS.**—The so-called "burning mountain" at Dudweiler, in the district of Saarbrück, which has been an object of interest to tourists and men of science for more than a century, is now shorn of its attractions: to the former it presents the spectacle of what it is, but a smoking mountain; to the latter it is a mere imposture, since, instead of being, as was supposed by earlier scientific observers, a display of volcanic action, or a proof of central fires, it is now generally established as the result of the spontaneous combustion of a stratum of coal. These smoldering fires, produced by some chage which takes place in the constituents of the coal may, indeed, burn with more or less intensity for centuries. The amount of such waste is peculiarly distressing at the present time, and the burning mountain of Dudweiler shows only common bed rock feeling by mitigating its destructive proceedings at this crisis. A coal bed at Mitterlantz, near Zweick

1997, 1998, 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010, 2011, 2012, 2013, 2014, 2015, 2016, 2017, 2018, 2019, 2020, 2021, 2022, 2023, 2024, 2025, 2026, 2027, 2028, 2029, 2030, 2031, 2032, 2033, 2034, 2035, 2036, 2037, 2038, 2039, 2040, 2041, 2042, 2043, 2044, 2045, 2046, 2047, 2048, 2049, 2050, 2051, 2052, 2053, 2054, 2055, 2056, 2057, 2058, 2059, 2060, 2061, 2062, 2063, 2064, 2065, 2066, 2067, 2068, 2069, 2070, 2071, 2072, 2073, 2074, 2075, 2076, 2077, 2078, 2079, 2080, 2081, 2082, 2083, 2084, 2085, 2086, 2087, 2088, 2089, 2090, 2091, 2092, 2093, 2094, 2095, 2096, 2097, 2098, 2099, 2100, 2101, 2102, 2103, 2104, 2105, 2106, 2107, 2108, 2109, 2110, 2111, 2112, 2113, 2114, 2115, 2116, 2117, 2118, 2119, 2120, 2121, 2122, 2123, 2124, 2125, 2126, 2127, 2128, 2129, 2130, 2131, 2132, 2133, 2134, 2135, 2136, 2137, 2138, 2139, 2140, 2141, 2142, 2143, 2144, 2145, 2146, 2147, 2148, 2149, 2150, 2151, 2152, 2153, 2154, 2155, 2156, 2157, 2158, 2159, 2160, 2161, 2162, 2163, 2164, 2165, 2166, 2167, 2168, 2169, 2170, 2171, 2172, 2173, 2174, 2175, 2176, 2177, 2178, 2179, 2180, 2181, 2182, 2183, 2184, 2185, 2186, 2187, 2188, 2189, 2190, 2191, 2192, 2193, 2194, 2195, 2196, 2197, 2198, 2199, 2200, 2201, 2202, 2203, 2204, 2205, 2206, 2207, 2208, 2209, 2210, 2211, 2212, 2213, 2214, 2215, 2216, 2217, 2218, 2219, 2220, 2221, 2222, 2223, 2224, 2225, 2226, 2227, 2228, 2229, 2230, 2231, 2232, 2233, 2234, 2235, 2236, 2237, 2238, 2239, 2240, 2241, 2242, 2243, 2244, 2245, 2246, 2247, 2248, 2249, 2250, 2251, 2252, 2253, 2254, 2255, 2256, 2257, 2258, 2259, 2260, 2261, 2262, 2263, 2264, 2265, 2266, 2267, 2268, 2269, 2270, 2271, 2272, 2273, 2274, 2275, 2276, 2277, 2278, 2279, 2280, 2281, 2282, 2283, 2284, 2285, 2286, 2287, 2288, 2289, 2290, 2291, 2292, 2293, 2294, 2295, 2296, 2297, 2298, 2299, 2300, 2301, 2302, 2303, 2304, 2305, 2306, 2307, 2308, 2309, 2310, 2311, 2312, 2313, 2314, 2315, 2316, 2317, 2318, 2319, 2320, 2321, 2322, 2323, 2324, 2325, 2326, 2327, 2328, 2329, 2330, 2331, 2332, 2333, 2334, 2335, 2336, 2337, 2338, 2339, 2340, 2341, 2342, 2343, 2344, 2345, 2346, 2347, 2348, 2349, 2350, 2351, 2352, 2353, 2354, 2355, 2356, 2357, 2358, 2359, 2360, 2361, 2362, 2363, 2364, 2365, 2366, 2367, 2368, 2369, 2370, 2371, 2372, 2373, 2374, 2375, 2376, 2377, 2378, 2379, 2380, 2381, 2382, 2383, 2384, 2385, 2386, 2387, 2388, 2389, 2390, 2391, 2392, 2393, 2394, 2395, 2396, 2397, 2398, 2399, 2400, 2401, 2402, 2403, 2404, 2405, 2406, 2407, 2408, 2409, 2410, 2411, 2412, 2413, 2414, 2415, 2416, 2417, 2418, 2419, 2420, 2421, 2422, 2423, 2424, 2425, 2426, 2427, 2428, 2429, 2430, 2431, 2432, 2433, 2434, 2435, 2436, 2437, 2438, 2439, 2440, 2441, 2442, 2443, 2444, 2445, 2446, 2447, 2448, 2449, 2450, 2451, 2452, 2453, 2454, 2455, 2456, 2457, 2458, 2459, 2460, 2461, 2462, 2463, 2464, 2465, 2466, 2467, 2468, 2469, 2470, 2471, 2472, 2473, 2474, 2475, 2476, 2477, 2478, 2479, 2480, 2481, 2482, 2483, 2484, 2485, 2486, 2487, 2488, 2489, 2490, 2491, 2492, 2493, 2494, 2495, 2496, 2497, 2498, 2499, 2500, 2501, 2502, 2503, 2504, 2505, 2506, 2507, 2508, 2509, 2510, 2511, 2512, 2513, 2514, 2515, 2516, 2517, 2518, 2519, 2520, 2521, 2522, 2523, 2524, 2525, 2526, 2527, 2528, 2529, 2530, 2531, 2532, 2533, 2534, 2535, 2536, 2537, 2538, 2539, 2540, 2541, 2542, 2543, 2544, 2545, 2546, 2547, 2548, 2549, 2550, 2551, 2552, 2553, 2554, 2555, 2556, 2557, 2558, 2559, 2560, 2561, 2562, 2563, 2564, 2565, 2566, 2567, 2568, 2569, 2570, 2571, 2572, 2573, 2574, 2575, 2576, 2577, 2578, 2579, 2580, 2581, 2582, 2583, 2584, 2585, 2586, 2587, 2588, 2589, 2590, 2591, 2592, 2593, 2594, 2595, 2596, 2597, 2598, 2599, 2600, 2601, 2602, 2603, 2604, 2605, 2606, 2607, 2608, 2609, 2610, 2611, 2612, 2613, 2614, 2615, 2616, 2617, 2618, 2619, 2620, 2621, 2622, 2623, 2624, 2625, 2626, 2627, 2628, 2629, 2630, 2631, 2632, 2633, 2634, 2635, 2636, 2637, 2638, 2639, 2640, 2641, 2642, 2643, 2644, 2645, 2646, 2647, 2648, 2649, 2650, 2651, 2652, 2653, 2654, 2655, 2656, 2657, 2658, 2659, 2660, 2661, 2662, 2663, 2664, 2665, 2666, 2667, 2668, 2669, 2670, 2671, 2672, 2673, 2674, 2675, 2676, 2677, 2678, 26

**SPECIAL BUSINESS IN—**

1.—Emma.  
Flagstaff.  
Last Chance.  
Richmond.  
Tecoma.

2.—The Mines of the Shropshire District.

3.—New Silver Rake: These shares should be secured for a great rise in price.  
English and Foreign Stocks, Railway, Bank, Dock, and other Shares dealt in at  
lowest prices for cash or on commission.

**CITY OFFICES, —18 and 14, CORNHILL, E.C.**



## Notices to Correspondents.

\* Much inconvenience having arisen in consequence of several of the Numbers during the past year being out of print, we recommend that the Journal should be filed on receipt: it then forms an accumulating useful work of reference.

**UTILISING WATER-POWER.**—In the "Notices to Correspondents," in last week's Journal, I see "Economy" wishes to know the best means of transmitting water-power to work his mill, three miles distant. I consider the best plan will be to compress air, and convey it in pipes to his mill, and by this means drive his machinery. If "Economy" will supply the necessary details as to relative level of stream and mill, &c., there will be no difficulty in furnishing him with an estimate and plans on this principle.—A. J. ATKY: *Cumtore, Aug. 5.*

**UTILISING WATER-POWER.**—If your correspondent, "Economy," will apply to Mr. J. Darlington, of Coleman-street-buildings, Moorgate-street, he will, I am sure readily obtain all the information he requires relative to the *modus operandi* and cost of transmitting water-power a distance of three miles or more to his manufactory. I have seen a beautiful piece of machinery erected by this gentleman with the same identical object at the Wildberg Mine, in Prussia, and it is found to answer admirably.—P. F.

**UTILISING WATER-POWER.**—I see that one of your correspondents, signing himself "Economy," wishes to know the best mode of transmitting his water-power to a manufactory three miles distant. Will "Economy" kindly say how much higher his manufactory is than the highest point at which he can take up the water for transmission?—A. J. A.

**TECOMA.**—The frequent highly favourable reports in the Journal of the Tecoma Mine, Utah, particularly in the issues of June 7 and June 28, induced me to purchase several shares in the company. In the Journal of June 28 there appears—"There are now 600 tons of ore at the smelting-works, and its grade is much higher than that of any one yet elsewhere found in Utah." A few days ago I saw a letter from Mr. Scott, the secretary of the company, of date late in July. In it he stated, as a highly favourable fact, "500 tons of ore at the furnace waiting for flux." Could someone concerned give a shareholder any information on the subject?—A. CONSTANT READER.

**UMBER.**—Will any reader oblige me with some particulars concerning the treatment of Umber, to make it marketable? I have a good strongly defined lode of Umber, and I should like to know if it is worth investing money to make it fit for the market. I should also be glad to have the address of a buyer.—A. E. J. T.: *St. Austell.*

We are compelled to postpone, until next week's Journal, the Report of the South Staffordshire and East Worcestershire Institute of Mining Engineers' Visit to the Lancashire Coal Field.

**UTILISING WATER-POWER.**—The letter from Mr. Sturgeon shall appear next week.

**THE MINERAL DEPOSITS OF MEXICO.**—In next week's Journal will appear a long letter upon the above subject from Mr. Spargo, of Gresham House.

**SHARE DEALING.**—We never interfere in the sale or purchase of shares; neither do we recommend any particular mine for investment or speculation, or broker through whom business should be transacted. The addresses of most of the latter appear in our advertising columns.

**AMERICAN SUBSCRIBERS.**—In reply to several enquiries, it may be stated that subscribers in the United States can be supplied with the *Mining Journal*, post free, at the price of \$8 gold per annum, payable in advance, by remitting to Mr. D. Van Nostrand, publisher, and importer of scientific books, &c., Murray street, New York; or, direct to our Office, 25, Fleet-street, E.C.

**MANUFACTURE OF IRON WITH HOT COKE AND GAS.**—A full description of the invention of Mr. Mickle, of Tynemouth, for Economising Fuel in Boiler Furnaces, appeared in the Supplement to last week's Journal.

**SCALE FOR ADVERTISEMENTS.**—Our charge for general advertisements is—for six lines and under, 4s.; per line afterwards, 8d. Average, 12 words per line.

**QUOTATIONS FOR MINE SHARES.**—We have frequently stated that, with regard to the quotations of many mine shares, it would be impossible to sell them at the quotations given in the Share List—or, indeed, to effect a sale at any price whatever in the market; yet, as the transactions are vouched for as having taken place, we are bound to record the prices as business done. It should be understood, however, that the prices are only those obtained by the promoters or others in a similar position from the public.

**Received.**—"S. E."—"T. H. R."—"E. A."—"C. S. R." (Colorado): Lent, and returned.—"Erin"—"H. B." (Rockland): Answered by post.—"Reader" (Melbourne): Yes; shall be glad to receive the articles: mining information is at all times acceptable.—"T. M."—"D. C. P."—"A. R."—"J. D." Next week.—"J. and H. G." (Hammersmith): "Reader" (Glasgow): "Emma": We never gave such advice.—"A Small Investor."

## THE MINING JOURNAL,

Railway and Commercial Gazette.

LONDON, AUGUST 9, 1873.

### THE WEIGHING OF COAL IN COLLIERIES.

Considerable agitation exists in several of our most important mining districts relative to the adoption of the weighing clauses of the Act of last year for the Regulation of Mines, and which came into operation on Friday, August 2. In more than one instance the inability of colliery owners to procure weighing machines has led to strikes on the part of the workmen. The consequence is that great and unnecessary loss has been the result of the peremptory and unjustifiable conduct of the miners, who appear to have been deaf to all reasoning. The employers have stated that they do not object to the coal being weighed at the pit banks when raised, but they ask for time, as the weighing-machine makers are inundated with orders, consequent on so many places requiring the same description of apparatus. The men in many instances, however, do not believe in the statements made as to the cause of machines not being put down, although the accuracy or otherwise of the reasons given can be easily ascertained by them. Instead, then, of enquiring as to whether machines can be obtained at once they show their power for injuring their employers by entirely stopping all work at the pits. This was especially the case in the Wigan district, where the miners, to the number of more than 10,000, struck work on the 2nd instant, on the ground, simply, that the employers did not do what was really impossible—have weighing-machines down at all the collieries on that day. This was done without the sanction of the executive of the Amalgamated Association, and shows how eager the men are, now that they are in the enjoyment of exceptionally high wages, for any pretext by which they can obtain a few days' idleness. They now consider themselves masters of the situation, and that they can do what they please in consequence of their employers not being in a position to at once comply with certain clauses of the Coal Mines Regulation Act. But no time should be lost in making them aware of the fact that they are acting illegally, and that they can be sued for compensation for loss occasioned by their neglecting or absenting themselves from work. This would be a very serious matter if carried out, for the loss to the colliery owners in the Wigan district cannot have been less than 10,000*l.* a day whilst their pits have been standing. That the power to obtain compensation is no mere assumption will be admitted when we state that mineowners can be exempted from putting down weighing-machines by the Home Secretary. The second paragraph of the 17th clause of the Act states that where it is proved to the satisfaction of a Secretary of State that by reason of any exigencies—"It is requisite or expedient that the persons employed in such mine, or class of mines, should not be paid by the weight of the mineral gotten by them, or that the beginning of such payment by weight should be postponed, such Secretary of State may, if he think fit, by order exempt such mine or class of mines from the provisions of this section, either without condition, or during the time and upon the conditions specified in the order."

Now, nearly all the employers—if not the whole of them—who were unable to have the machines placed on their pits on the 2nd inst. had made the necessary applications for an extension of time, which was granted, thus rendering the acts of the men who neglected their work in every way illegal, and liable to be sued for compensation. Let, however, the men should hereafter plead ignorance of the law, we would suggest that a portion of the 17th clause should be posted at the pit banks, showing them that the weighing of coal can be postponed by means of an application to a Secretary of State.

In South Wales the weighing clause has been adopted, but there has been a misunderstanding which at one time threatened to lead to a disruption. The difference did not refer to the weighing principle, but to the standard, or statute, ton, and that which has hitherto prevailed. The men, it appears, have, until recently received so much money for some 24 or 25 cwt. of coal, which has been called a ton, but demanded that the ton should be the statute one of 20 cwt. The disagreement, however, has been amicably arranged by the employers agreeing to the statute ton, and the men accepting a corresponding decrease of wages, so that they will just be in the position they were.

Despite the efforts of the Legislature to prevent conflicts between employers and workmen in carrying out the provisions of the Act,

it would appear that under any circumstances the men will find a grievance, and one sufficient in their eyes to cause an entire stoppage of work, and consequent serious loss to colliery owners. We believe, however, that the weighing clauses, which are looked upon by the miners as amongst the most important in the Act, will be worked out in time to the entire satisfaction of masters as well as men, the principle being, undoubtedly, the fairest for all parties.

### THE EFFECTS OF THE HIGH PRICE OF COAL ON OUR FOREIGN TRADE.

On many occasions recently when drawing attention to the high price of coal in this country we asserted that the effect of it would be the depriving us of many of the foreign markets to which we had been in the habit of sending our mineral products. This appeared to us to be a natural consequence of the extraordinary and unprecedented charge made for an article which is to be found in almost all parts of the Continent, as well as in more distant countries, in some of them in greater abundance even than in England. We feel no surprise, then, to find that some of our old customers have been led to look to their own power of producing what they had previously been supplied with from this country. Russia is now opening out collieries, and manufacturing iron and steel. France and Belgium are increasing their production of coal and iron, so is America and our North American and other colonies. The price of fuel has also seriously affected our position on the Continent with regard to both iron and steel—so much so, that we are now unable to hold our own against some of the continental manufacturers. Of this we have just had a most telling illustration. The Belgian Government required tenders for supplying 12,000 tons of Bessemer rails, and the competitors included some of the leading firms in England, France, and Liège. In the former were the Ebbw Vale Company, and BROWN, BAILEY, and DIXON, Sheffield. The tenders varied from 18*l.* 2s. 6d. to 19*l.* 2s. per ton. The lowest tender, the one accepted, was that of Messrs. SCHNEIDER, of Creuzot, the largest firm in France, having extensive coal mines, and finding employment for upwards of 10,000 persons. Now, there cannot be the slightest doubt but that the price of coal entered largely into the estimates sent in by the English manufacturers, and that it was entirely owing to it that the contract was lost to this country. Our colliery proprietors must, then, be credited with having given a great impetus to foreign made iron and steel in opposition to that of our own makers, and which must ultimately tend to their own disadvantage. The decrease in the make of iron and steel in this country must lead to a corresponding decrease in the consumption of coal, as well as to a considerable reduction of its price; and it appears we are now fast drifting in that direction. Coal which last year was sold for 7*l.* or 8*l.* per ton at most cannot now be obtained at less than 20*l.*, so that if we take the price of fuel for making a ton of Bessemer from the raw ore the cost will now be at least 2*l.* per ton more than it was during the same period of last year. This in itself is sufficient to account for our Bessemer makers being unable to compete with such firms as SCHNEIDER and Co., whose coal does not cost one-third of what is charged for English.

If our ironmasters, and those engaged in rolling steel, are to be driven out of markets where they have long held almost undisputed sway, owing to the cost of coal, it is evident that in the long run colliery proprietors will suffer with them. The policy of merely living for the present, careless for the future, is by no means a safe or wise one; therefore the circumstances attending the competition for supplying Bessemer rails to the Belgian Government, to which we have alluded, ought to be well weighed and seriously considered by the coalowners of this country. They will find that the coal and iron interests are so interwoven that whatever tends to depress the one will have the same effect upon the other, and that it is much easier to drive trade out of the country than to attract it back again when the circumstances which led to its loss have passed away.

### COAL IN THE UNITED STATES.

Increasing attention is being directed in the United States to the utilization of the immense stores of coal which the Great Republic undoubtedly possesses, but which have hitherto remained comparatively untouched. The recent course of the British coal trade has been very attentively watched by the Americans, who appear to think that they shall be able to develop an export trade in coal in competition to some extent with British combustible. The Americans have at present no sufficient exact survey to indicate how much coal the United States have in reserve, but, from the most careful and trustworthy estimates which can be made, it appears that the known coal fields of the Great Republic embrace an area of not less than 230,000 square miles. The geographical distribution of these enormous coal supplies is somewhat as follows:—New England basin, 700 square miles; Pennsylvania anthracite, 434 square miles; Appalachian basin (Pennsylvania, Maryland, West Virginia, Ohio, East Kentucky, Tennessee, and Alabama), 62,872 square miles; Michigan basin, 9700 square miles; Illinois basin (Illinois, Indiana, and West Kentucky), 51,700 square miles; Missouri basin, 100,000 square miles; and Texas basin, 5500 square miles. The number of beds in the New England basin is 23; in the Pennsylvania anthracite basin, 5; in the Appalachian basin, so far as known, 73; and in the Illinois basin, 34. No definite information exists as to the number of beds in the Michigan, Missouri, and Texas basins. These data embrace the seven principal coal areas of the United States. The eighth, of which comparatively little is known, lies within what is styled the Rocky Mountains region, and consists chiefly of beds of soft bituminous coal and lignites, which are already coming into general use, and which, in a country naturally deficient in wood, have a great and increasing value. The geographical distribution of the coal basins of the United States is such that when increased transport facilities have established a more intimate intercommunication between the various States, no combination of coalowners and carriers will long be able to deprive any part of the Republic of the advantages of a cheap and abundant supply of coal.

One of the States comprised in the vast territories of Brother Jonathan—Virginia—is especially rich in minerals. When the Americans begin to descend upon the coal and mineral resources of Virginia language almost fails to keep pace with their boasts. Thus a recent writer on the subject says:—"The mineral wealth of all other countries appears as poverty in comparison with the wonderful resources of Virginia. It is scarcely an exaggeration to assert that her mere surface deposits of coal and iron ore would suffice for the consumption of all the generations of mankind for centuries to come!" This language may, perhaps, be said to be overstrained, and, certainly, it sounds strange when placed side by side with the fact that the Legislature of Virginia not long since passed an Act declaring that the Commonwealth could not fully meet at present the interest accruing upon its public debt, but still we may take it as a fact that Virginia is very rich in coal and iron. With these advantages, and with the additional benefit of contiguity to the Atlantic seaboard, the prosperity of Virginia seems to be only a question of time. At present her mineral resources have been almost untouched. In the Kanawha Valley the deposits of splint coal which are met with are especially valuable and extensive. This coal derives its name from the character of the fragments or pieces into which it separates. Its freedom from sulphur and other impurities renders it especially valuable in smelting ores and in the manufacture of iron and steel, and in this respect it is a valuable substitute for charcoal. It is said to be equal in quality to the best English cannel coal, and the Cannelton Company, consisting chiefly of New York capitalists, mines this coal, ships it at New York, and sells it at a profit at from \$8 to \$12 per ton, against \$22 per ton charged for English cannel coal. The splint coal is not limited to the Kanawha, but it is found in all the adjacent valleys and in the entire Virginian region. The coal is virtually embedded in strata of iron ore, the whole character of the mineral formations establishing the conclusion that Nature herself has destined the two States of Virginia and West Virginia to be a prominent, if not, indeed, the most prominent, centre of the iron trade of the United States. The completion of the Chesapeake and Ohio Railroad, which intersects the mineral regions of Virginia, affords an outlet on the one hand to the

seaboard, and on the other hand to the great markets of the Chesapeake and Ohio will create a new Virginia.

### TECHNICAL EDUCATION, AND THE CITY GUILDS.

During the past few years several prominent Liverymen have exerted themselves to the utmost at the courts of their respective guilds, with a view to secure the proper encouragement of technical skill, by the award of the prizes and otherwise, amongst the men of the trades represented; and in the communications of the correspondent, Mr. F. W. CAMPBELL, a Liveryman of the Haberdashers' Company, the matter has frequently been brought before the readers of the Journal. The honour of having first taken an effective step toward the recognition of skill among the members of their craft due to the Turners, and under their present worshipful master, Prof. TENNANT, F.G.S.—there is every probability of the workmen in for competition proving equal to any which the country can produce. In continuation of their action in former years, the Master Wardens, and Court of Assistants of the Worshipful Company of Turners of London now offer their silver medal and the Freedom of the Company and of the City of London to any one, workman or apprentice, who may send in the best specimens of hand-turning this year in either ivory or stone. Under the word stone is included any natural substance of a mineral character, excluding, however, all those which, like china or pottery, require baking or burning. Porphyry, granite, jasper, agate, serpentine, marble, spar, alabaster, jet, coal, freestone, &c., are examples of what may be used. The specimens under the head "stone" will be arranged in different classes, according to material, and in each class a medal will be given if considered worthy; but the chief medal and freedom will be adjudged to the specimen which the judges may decide possess paramount merit.

Every precaution appears to have been taken to insure the award being made for practical merit only, and hence the qualities which will be chiefly considered in awarding the prize in stone are—accuracy of original design in shape and colour, accuracy of copying, skill in overcoming difficulties in regard to the material, and originality, novelty, or especial skill in any other particular as applied to the class of work. It is pointed out that the specimens may be either in the natural state of the material, or they may be ornamented with artificial colouring, gilding, inlaying, &c., though preference will be given to those which exhibit with the most skill, and to the greatest advantage, the natural properties of the material. Carving is admissible, but must be subsidiary to the turning. In ivory, tazas, and similar examples, special regard should be given to the form by causing the lines to run freely into each other, so that where they meet there shall be no abruptness, and in each material sufficient strength should be given to the various parts to bear ordinary handling. The specimens may be copies of any known work, and may be either of the same size or reduced. The merit will consist in the most perfect reproduction of the character of the original. This quality may also be shown by pairs of specimens, which shall be facsimiles in every respect. With respect to size, no specimen must exceed 2 ft. or 2 ft. 6 in. in any dimension.

The conditions of the competition in ivory turning are nearly similar. With regard to both stone and ivory the specimens of the competitor must be enclosed in a box or boxes, marked with a private mark or motto, and, if there be more boxes than one, numbered in succession, accompanied by a list explanatory of the contents of each box. They must be accompanied also by a sealed envelope marked with the same mark or motto, containing the name and address of the competitor, and in all cases a certificate of good character, as well as the certificates hereafter named. The age of the candidate must be stated outside the envelope. These will not be opened until the judges have made their report. The specimens sent will remain the property of the competitor; care will be taken of them, but the Court will not hold themselves responsible for their safety. The candidates must remove the specimens at their own cost within a week of the decision being communicated to them. The successful candidates will be required to supply satisfactory certificates of the work having been done by their hands only, and its being done during the period of competition; and they may be required to do, in the presence of the judges, a portion of work similar to the successful exhibit.

The award of the prizes for Turning in Stone has been entrusted to Mr. JOSEPH HALL, of Derby; Dr. WM. POLE, F.R.S., of Westminster; and Prof. TENNANT, F.G.S., of King's College, London; and for Turning in Ivory to Messrs. JOHN JACQUES, THOMAS FORSHAW, THOMAS BOORMAN WINNER, and H. WEEKES, R.A., all citizens and turners, whilst the LORD MAYOR has kindly consented to present the prize on Oct. 13. In the competition last year for Turning in Steel the successful candidate was, for the silver medal, LEWIS DUNN; the bronze medal, HENRY JOHN MANN; and the recipients of certificates of merit were THOMAS ARTHUR NELSON and Mrs. M. The honour attaching to the earning of these prizes can scarcely be over-estimated, for the credit of wearing the livery of a trade guild of the City of London, when it has been earned by absolute technical skill, must be acknowledged to be incomparably greater than that which has been obtained by either patrimony or purchase. In instituting these distinctions and prizes the Worshipful Company of Turners of London has set an example which the other trade guilds of the City will do well to follow, and we do not hesitate to say that the result will be not only to lead the operatives engaged in the various trades to aim at a superior class of workmanship, but to increase the respect generally entertained for the guilds themselves.

**UNWROUGHT STEEL.**—The exports of unwrought steel from the United Kingdom in the month of June amounted to 3674 tons compared with 3613 tons in June, 1872, and 2886 tons in June, 1871; and in the six months ending June 30 this year, 20,652 tons as compared with 21,731 tons in the corresponding period of 1872 and 15,917 tons in the corresponding period of the year 1871. These totals the exports to France figured for 1478 tons, 1560 tons and 344 tons respectively; and those to the United States for 100 tons, 12,260 tons, and 8999 tons respectively. The value of the unwrought steel exported from the United Kingdom in June was 131,072*l.*, as compared with 108,442*l.* in June, 1872, and 89,202*l.* in June, 1871; and in the six months ending June 30 this year 751,284*l.* as compared with 696,340*l.* in the corresponding period of 1872, and 496,705*l.* in the corresponding period of 1871.

**VIENNA EXHIBITION.**—INTERNATIONAL CONGRESS OF MINING AND SMELTERS.—The programme of this congress, which is to be held in Vienna from August 24 to August 27 inclusive, has just been issued. The gentlemen interested in mining and smelting matters who propose to take part in the congress will preliminarily assemble at the Hotel Tauber, in the Praterstrasse, on Aug. 23, at 8 o'clock, in the evening, and on the following morning, at 10 o'clock, the general sitting will be held in the Jury Pavilion of the Vienna Exhibition, when the sections will be arranged. In the afternoon, at 3 o'clock, a friendly dinner will take place, by way of general introduction; and at 8 o'clock in the evening there will be another meeting at the Hotel Tauber. At the first general sitting the congress will be opened, and a president, vice-president, and two recording secretaries appointed. Each of the sections for Mining, Metallurgy, and for General Questions (embracing Statistics, Working Arrangements, Questions of Transport, &c.), will at the sitting also appoint a president, vice-president, and two recording secretaries, and discuss the special details for their section. On Aug. 25, the sittings of the several sections will commence at 10 o'clock, and in the evening, at 8 o'clock, there will be a general meeting at a place to be named. All papers intended to be read must be in the hands of the Executive Committee (they should be addressed—An das vorbereitende Comité der internationalen Ausstellung von Berg- und Hüttenmännern zu Handen des Obmanns Herrn F. M. Friese, III. Ungargasse, 3, Wien) at least two days previously, or they will not be inserted for reading in the order of day. Participation in the congress is secured by the payment of a fee of 5 *fl.* (= 10*s.*) toward the expenses of the congress, and tickets will be obtainable after Aug. 20, at the Jury Pavilion.



Gas coal, 30s. to 37s.; cannel, 42s. to 50s.; Boghead mineral, 62s. 6d. to 72s. 6d.; steam and household coal, 15s. to 17s., all per ton f.o.b.

**UNPRECEDENTED LIBERALITY.**—Mr. James Baird, of Auchmed-



den, the Scotch ironmaster, has paid over to a body of trustees, to be called the Baird Trust, the sum of 500,000*l.*, to be applied for religious purposes in connection with the Church of Scotland.

#### REPORT FROM DERBYSHIRE AND YORKSHIRE.

Aug. 7.—The lead mines in Derbyshire are pursuing the even tenor of their way without making any stir or noise, the production being steady. The Mill Dam Company had a meeting at the mine, at Great Hucklow, a few days since, when a dividend of 5*s.* per share was declared. The colliers have been unusually busy for the time of year, and a larger tonnage has been sent to the metropolis than for several months past. This has been especially the case with regard to Clay Cross, Langley Mill, and Etkington. A very good business has also been done by the Great Eastern and the Midland Railways to the various districts through which their lines pass. The Bessemer Works at Dronfield are turning out a large quantity of rails, whilst some new collieries are being sunk in the district which is fast becoming a very important one. The Sheffield Trades' Union, however, is fast becoming a very important one. The Sheffield Trades' Union, however, is fast becoming a very important one. The Sheffield Trades' Union, however, is fast becoming a very important one.

**PROPOSED COAL EXCHANGE FOR YORKSHIRE.**—The adjourned meeting of the Midland Institute of Mining Engineers was held at Barnsley on Wednesday, for the purpose of considering the erection of a Coal Exchange for Yorkshire, as well as rooms for the Institute. There was a good attendance of the members from various parts of the West Yorkshire and the South Yorkshire districts. Mr. W. P. Madison, the President of the Institute, took the chair. The minutes of the sub-committee, as well as a report put in by that body, were read. From the report it appeared that meetings had been held at Barnsley, Leeds, and Wakefield, and communications had been opened up with Mr. Stewart, the Chairman of the South Yorkshire Coalowners' Association, and Mr. Tennant, the Chairman of the West Yorkshire Coalowners' Association. Mr. Stewart was of opinion that the coalowners would be able to erect a building independent of the Mechanics' Institute, who had invited them to throw in their lot with them in the erection of a building. He threw out a suggestion, that the coalowners should be invited to hold their meetings at a building of that sort, which he thought they would prefer, to holding them at an hotel. He expressed himself as strongly in favour of the building being erected in Barnsley. Mr. Tennant was in favour of the erection being in Leeds, as Leeds and Barnsley joined the centres of the two great coal fields. Probably some neutral might be accepted. It was agreed that the matter should be again left in the hands of the sub-committee and the gentlemen named; and on the motion of Mr. Beaumont, seconded by Mr. Smith, they were requested to continue their enquiries and investigations, and report to the members not later than the next annual meeting of members, but sooner if they could do so, the result of their enquiries.

**DARFIELD MAIN COLLIERY.—MECHANICAL VENTILATION OF MINES.**—It may be recollected that in October last the Darfield Main Colliery, situated about four miles from Barnsley, caught fire by some slack being in great proximity to the furnace, and which led to the whole of the works being flooded. Since that time a considerable number of men have been engaged in getting the water out and repairing the shaft. To ensure their safety, and maintain the ventilation in the shaft, a very powerful fan was constructed and put down by Messrs. Easton and Tattersall, of the Alexandra Foundry, Leeds. It has so far worked most admirably. It is 40 feet in diameter, and is connected or driven by a high-pressure horizontal engine, made by the same firm; in fact, there are two engines, one being kept in reserve in case of accident. The fan is the most powerful one yet seen in Yorkshire, and whilst at work at Darfield has been visited by a large number of colliery owners and mining engineers, who consider it the best yet introduced for ventilating collieries at a comparatively moderate cost. On Wednesday last, Mr. Ackroyd, of the Morley Colliery, together with other coal proprietors and mining engineers, visited Darfield, for the purpose of seeing the fan. The results given were in the highest degree satisfactory, 20 revolutions per minute giving 0.8 water gauge; 30 revs., 1.2 w. g.; 40 revs., 2.2 w. g.; 50 revs., 3 w. g.; 55 revs., 3.7 w. g.; 59 revs., 3.8 w. g.; 61 revs., 4.1 w. g.; 65 revs., 5.1 w. g.; and 66 revs., 5.2 w. g. The Leeds fan, as it is termed, has made considerable headway it appears, and several of them are now being put down at the Denaby Main, and other collieries in South and West Yorkshire, the invention being pronounced one of the great mining successes of the year. Messrs. Easton and Tattersall have also completed an engine to be worked by compressed air, the air-cylinders, being patented by the firm named, are of rather peculiar construction, the valves consisting of an elastic tube, through which runs a current of water. The engines used for compressing the air also wind the coal. With regard to the colliery itself, it may be said that considerable progress has been made in repairing the damage done. The shafts have been cleared of the water, and the men have been engaged during the last few days in the shaft, whilst a communication between the two shafts has been effected. The next work will be to repair the roads and clear away the fallen material, which must occupy some time. The loss to the owners by the fire has been most serious in every way, and before work is resumed it will in all likelihood make a difference to them of something closely approximating to 100,000*l.* The high price of coal has also had the effect of their having to pay full rates for the coal they supply to some of their old customers.

#### REPORT FROM MONMOUTH AND SOUTH WALES.

Aug. 7.—There is hardly any perceptible improvement in the Iron Trade this week, but, on the whole, the aspect of things is somewhat more hopeful. It cannot be said that orders are coming in much more freely, but buyers evince a little more disposition to purchase. It is not because iron has become a drug in the market that they do not purchase extensively, but they still cling to the belief that prices must be reduced considerably. What reasons buyers have for such a belief is best known to themselves. It is certain that neither the present state of things nor that foreshadowed in the future, as far as can at present be penetrated, afford any basis upon which to found expectations of lower quotations. It must be expected that, so long as the cost of everything employed in the manufacture of iron is so high as at present, it will be impossible that makers can make any appreciable reduction in quotations for finished iron. And what prospect is there that the cost of the commodities alluded to will be lower in value? Indeed, the probabilities are to the contrary. The chances are almost ten to one that coal will be still dearer in the course of the next three months than it has been at all; and the labour market, both as regards iron-making and coal-raising, is far from being in such a state as to induce iron-makers or colliery proprietors to offer lower rates of wages. Still makers are everywhere disposed to meet their customers, and wherever it is practicable to make concessions in prices it is done, but these are necessarily very slight. In a lower direction, however, further prices cannot go, and consequently it is to be noticed that nearly all manufacturers adhere firmly to the quotations they now ask. Of these it may be mentioned that in this district rails range from 10*l.* 10*s.* to 11*l.* 10*s.* At some of the works stocking is going on in preference to selling at unprofitable prices. The works, it is gratifying to find, are in good employ, and during the past week the following exports have been effected:—Messina, 223 tons rail; Antwerp, 400 tons rail; Riga, 1700 tons rail; New York, 254 tons rail; Genoa, 650 tons rail; Calmer, 310 tons rail; Santos, 195 tons rail; Stockholm, 820 tons rail; Baltimore, 345 tons rail; and Rio de Janeiro, 380 tons rail. It is noticeable that the clearances, though more varied and numerous, are smaller than they recorded usually, and particularly that the United States are taking the smallest quantities of all, whereas America has generally been the mainstay of the rail trade of South Wales. Something like steady work is found at the tin-plate works, and the state of the trade is not such as to cause much complaining among manufacturers.

The great demand for coal continues, and the only thing necessary to a brisk trade is regular working at the collieries. When this may be witnessed, however, it is difficult to tell, probably not while wages remain so high, and there are so many attractions for colliers out of the pit. I stated last week that it was probable that the matters then threatening interruption to the coal trade would be satisfactorily settled between masters and men. Although an amicable arrangement has been come to in regard to the weighing issue, there has not been much work done in any of the collieries during the present week. Meetings have been held in various parts of the district to discuss the questions relating to the imperial ton, and the price to be paid for it; and in the majority of instances resolutions have been passed approving of the advice of the executive of the Miners' Union—to submit to a corresponding reduction in the rate of payment where the imperial ton is adopted. The great majority of the ironworkers and steam coal colliers have agreed that it would not be reasonable to claim of the masters the same price for cutting 20 cwt. as for 24 cwt., and it only remained then to settle what the corresponding reduction would be. This has been settled by a meeting of iron and coal masters, where it was determined that the payment of wages to colliers shall in future be made in the imperial ton, with a corresponding adjustment of wages, so that there shall be no advance or reduction in the amount payable, and in adjusting the proportionate rate to be paid for the imperial ton the fractions shall be worked to a tenth of a penny, and any further difference shall be given or taken in the principal, that in case the further fractional part of a penny shall be 5-100ths of a ton, or above it shall be reckoned as a tenth for the benefit of the men, but if under 5-100ths it shall be retained by the employers. It cannot be said, however, that all the men have agreed to the arrangement; a considerable number of colliers in the Rhondda Valley continue to demand of their masters the same price for cutting the new as they have hitherto received for cutting the old ton, and they have virtually been on strike all the week. Their unreasonable demand is rightly denounced by all right-thinking colliers, and they will, of course, have to give way. If they think that the present rate of wages is not high enough, let them ask for an advance in the usual way. But it cannot be denied that there are some men who are always glad to have some excuse for keeping out of the pits, and if they work one full week they want to be idle the next. Then there is another point upon which they want to base their reasons for striking; the violation of the imperial ton will necessitate the removal of all present weighing machines, and this will, of course, take some time to accomplish. These striking men say we won't work any more until new machines are put up; but, again, they are disabused by the majority, who take the more reasonable course of continuing work, and giving masters time to put up new machines. Some of the dissentients are, however, coming round, and it is believed that by the end of the week all will have agreed to accept the masters' terms. Work has been resumed at the Powell Duffryn Steam Coal Company's Colliery at Tredegar.

The men employed at the Llynvi Iron and Coal Works have presented Mr. Colquhoun with a handsome testimonial in the shape of a tea and coffee service. Mr. Colquhoun has had the management of the Llynvi Works for the last five years, but he is now about to transfer his services to the Tredegar Ironworks.

**THE NEW MINING ACT, AND THE MANAGERS.**—Mr. Davey Thomas, Llynvillid Colliery, a private pupil of W. Samuel, B.A., has had his name sent up to Mr. Secretary Bruce, Home Office, as having assisted the examiners at Swansea last week of his fitness to receive the certificate of competency, according to the

requirements of the new mining Act. The subjects in which the candidates were tested were geology, ventilation, knowledge of the Act, steam-engines, and boilers—the new "Special Rules."

#### TRADE OF THE TYNE AND WEAR.

Aug. 7.—The general state of trade is extremely quiet; on the Tyne and Wear the contrast is very striking between the present terms and six months ago. The demand for coal of all kinds is getting weaker, and considerable stocks are accumulating at some of the works, while at many of them short time has also been resorted to. Steam coals can now be bought of excellent quality for less than 20*s.* per ton, and there is no particular demand for coal of any class. No. 3 pig-iron is quoted at 95*s.* to 100*s.* per ton, and manufacturing coal can be bought freely for 12*s.* 6*d.* per ton at the pits.

New coal workings are in progress in many localities, and especially in South Durham. Several very extensive works are in progress there, and when we consider that these new workings are now made on such a gigantic scale it is clear that the output of coal must be vastly increased. At Cambois Colliery, one of the finest steam coal works in Northumberland, during the last three working days of last week 4480 tons of coal were raised, which is equal to nearly 1500 tons per day, and most of these new works alluded to are on a scale similar to Cambois. At the new winning, to be commenced immediately at Whitburn, the shafts are, we understand, to be not less than 21 ft. in diameter, and all the appliances on a scale in proportion. Mechanical ventilation with the Guibal fan has proved eminently successful here, and, consequently, continues to make good progress. A fan of moderate dimensions comparatively has been lately started at Brandon Colliery, in the Auckland district, and a large quantity of air is got by it. This fan is 35 ft. in diameter, and the enormous ventilation, amounting to 225,000 cubic feet per minute has been produced by it. Some elaborate experiments are to be made in a few days with the fan, in order to test its capabilities, and of which we will furnish a detailed account of the results obtained. It must be noticed that these fans, at (say) 35 ft. diameter, can be run at a very high speed—up to 70 revolutions per minute. The Lemielle ventilator erected at the Washington Colliery a few years ago has been taken out, and a Guibal fan is now in course of erection in its place. This is to be regretted, as the Lemielle ventilator is considered by many engineers to be specially adapted for ventilating purposes where a high water gauge is to be used; it is, in fact, a powerful ventilator, but perhaps the greatest objection to it (for there are other objections made to it) is the great difficulty experienced in keeping the bearings right, as the main shaft is vertical and the mining apparatus heavy; this has proved a difficulty of a very serious nature.

### The Prize Essay—Practical Mining.

No. XIV.

#### SECOND ESSAY—PART VIII.

##### PISTONS.

On Quick and Sampson's principle, because they require no stopping for constant packing, and keep the cylinder much truer and cleaner than the present method, they economise fuel, giving increased power, produce a better vacuum, the friction is decreased to a minimum, and are of less cost.

##### VALVES.

Husband's patent four-beat valve, because there is no shock from its action, greater area for passage of water, equal wear of beats, &c. I have known them to be in position for five and six years without requiring any attention or repairs.

##### PITWORK.

As described, for its simplicity and easy action.

##### BOILERS.

The cylindrical one-flued type, or Cornish boiler, well clothed, provided with Galloway tubes, and feed arrangement, as described.

##### WATER POWER.

Should be utilised, and when we know that valleys in France have been dammed up to the height of 50 metres, and vast quantities of water are stored for the summer months for supply of innumerable factories along the aqueduct, we readily perceive how backward miners are in this country in putting into operation this great source of power. Catch-water reservoirs might be constructed in numerous districts in Cornwall, where the contour of the country is eminently adapted for the prosecution of such structures. With this power we utilise numerous adaptations and appliances—water-wheels, turbines, hydraulic pressure pipes and machinery, &c., as described.

##### WINDMILLS.

Will, no doubt, ere long receive some attention.

##### HOISTING ENGINE.

A pair of horizontal engines, the cranks of each connected with the same winding drum, and fixed at quarter stroke. See description.

##### SKIPS.

The best I am acquainted with is Phillip's patent, now in extensive use in the western mines; it is supplied with catches in case of fracture of the rope, and is too well known to need any description here (also kibles). See "hoisting" for tramroads and wagons, guided shafts, and safety cages, speed, and sundry appliances for engines, &c.

##### ROPES.

Wire ropes are superior to chains or hempen ropes, round wire ropes preferable to flat ditto, and steel wire ropes most preferable, but they do not seem to have had that attention which is required. All wire ropes ought to be kept from the influence of the weather, and moderately clean, not as in many instances, as I have seen them, daubed, no one knows how thick, with a substance called grease, which often is more injury than good; being so dirty, of course, inspection is out of the question. This dirt will harden on the rope in places forming knots, or bunches, and this, if not removed, will have the same effect as a bandage would around the rope, which was the cause of the Cannock Chase Colliery accident in 1867. This bandage of hemp was placed there by the engineer to show when the cage was opposite a certain level, and by continually running to and fro over a small pulley, and under the drum, also of small diameter, the constant bending broke off the wires. The worn and broken parts are not discovered until an accident occurs; a little good clean tallow mixed with Stockholm tar would preserve the rope much better, and be far more economical than loading it with black and impure stuff many removes from grease. We might here digress a little, and refer to the daubing of the cams and lifters of stamps with large quantities of this stuff, instead of using a very little good grease or other lubricant. It drops into the tinstuff and carries away with it some of the fine tin; now, this should be remedied, and I see no reason why mine machinery should not be kept in equally good and efficient order as in any other mill. Some mills of California are running in perfect order, cleanliness, and economy, but the above is not economical or wise. The whole length of surface rope should be boarded over, and the inside of the structure whitewashed; a few small windows being provided, it will serve for shelter for the workpeople, who are often sadly exposed during the winter months; this shed might be made to cover a large portion of the banks. The drums should be made large; in some collieries as much as 25 ft. have been used; a small drum soon destroys the rope by its many sharp bends, and winding on itself, which destroys the strands; this is obviated in the large drum, which should be cased with wood and trued up in a lathe, and drums and pulleys erected with the greatest accuracy; the groove in the pulley being sufficiently wide to allow the rope perfect play when at either end of the drum.

##### MAN-ENGINE.

The single rod, because it is the most simple, its non-liability to get out of repair, and the men are landed at their respective levels with the greatest speed.

##### STAMPS.

Husband's Pneumatic, because it does more work, at less cost, is a simple and durable machine, and put through ten times as much stuff as the old stamps; also, as stated by Mr. J. Bickle, in a paper read at the Royal Polytechnic, Falmouth, August 22, 1872, the tin is discharged from the coffer in a better condition than with the ordinary stamps, for the fact is established that owing to the quick

motion in the coffer the tin, when separated from its matrix, has no time to settle, and to be crushed to slime, but is discharged soon as it is reduced to the required size to pass through the stamps; consequently, most of the tin is found at the heads of the stamps, much less passes off in slimes than with the old method of stamping; this result was confidently expected, and has now been actually realised.

##### REVOLVING STAMPS.

To those who prefer sticking to an older method, the description here given of Harvey and Co.'s revolving head is the best, for the drudge stamps is not to be recommended at all.

##### STONE-BREAKER.

Blake's, because of its great strength, non-liability to get out of repair, and passes through a large quantity of good work with description.

##### ROLLS.

Of sizes as described, with trommels and elevators.

##### PULVERISERS.

Dingey's patent pulveriser for grinding roughs is, no doubt, the best yet introduced for this purpose.

##### TROMMELS.

See description—Ore-dressing.

##### JIGGING MACHINE.

Petherick invented the hydraulic jigger; all others are derived from this, and his jig, with the Kley slide motion, is best, because of its simplicity, sureness of action, and speed at which the stuff put out.

##### BUDDLES.

The convex, or outward flow, ordinary round Cornish buddle, for general purposes, I hold to be best; but Borlase's is a good buddle, and may be profitably employed in gold mines, where a quantity of iron pyrites is found among the stuff.

##### SEPARATORS.

Hunt's patent ore separator is a machine to be recommended, works off a large quantity of stuff, require little power, and water economically.

##### ROCK-BORING MACHINE.

Burleigh's, because of its lightness and adaptability for firing the levels of metalliferous mines, and speed of boring. This machine is eminently adapted for shaft sinking, and if more attention was paid to sinking the shafts straight, and putting in the skips with precision, less repairs would be required, and less power consumed. Modern miners are now driving levels larger than hitherto, which will admit of the machine being used with ease, and produce good ventilation, as well as working way; it is most economy to be working in a constrained attitude, the ordinary roadway should be 7 ft. high by 4 ft. wide, the dimensions adhered to strictly, and the level kept with great accuracy. Constant supervision in this respect is always amply repaid, and is economy in the end. Of course circumstances will alter dimensions, but given, and the ever varying character of the mineral veins, especially in Cornwall, call for the judgment and skill of the agent, not with a view to the safety of the mine, but also as to the economy of its work. See description of machine. Rock-boring will soon become universal, and we should not despair of yet perfecting tunnelling machine also suitable to metalliferous mines.

##### GAS IN MINES.

Is practicable, and cheaper than candles. See description. All dressing-floors should be lit by gas.

##### REPORTING.

We should resume the good old practice of duty reporting; for a well-known fact that most of our mine machinery is not kept after as it should be, and the management of the engines is not such skillful hands as most machinery in foreign mines. I think there can be nothing more disgraceful than for engineers or employers to appoint unqualified, ignorant men to work the important machinery in the mine. This is not economy, as many of many mine engines will prove to the initiated they are not a good duty, and are not kept in repair; therefore, waste and wear are much larger than if competent attendants were employed and properly paid. There should also be a proper daily count kept of work turned out by stamps and each machine, and periodical assays of the tailings and other data tabulated in a book kept for that purpose. Those tables of duty, assays, and others should form a portion of the information supplied in the reports, the publication of such facts would be exchanged, and the various machines and processes be so sifted that it would help raise mining from being a speculation to a safe investment.

I have now spoken of most subjects connected with Best Mine Machinery. The questions requiring a reply was first a knowledge of the most approved description of machinery and its Descriptions are given as near as may be expected without the aid of drawings. Secondly, the names of the most reputable makers with a description of the manufacturers, which have made me celebrated? If we may judge by the work turned out by Harvey and Co., Hayle, Cornwall, it would seem to indicate that this are the most celebrated hydraulic and mining engineers in England as hydraulic engineers witness the colossal machines erected for supply of water to London, which are almost universally adopted. Three-fourths of the water supply is raised by engines erected and kept in repair by this company and other works as described. With reference to mining machinery, I have seen almost every known appliance of any merit turned out from these extensive works at Hayle; their reputation is acknowledged in every mining country that I have been in, and among the numerous engineering mining fraternity of London, and are justly celebrated for the production of pumping and winding engines, patent, and other mining machinery and every kind of machine, apparatus, and tools, enumerated here, suitable for developing a large mining property. Thirdly, the result of my experience? This has been varied, most of the machines at home and abroad; that which I have commended need no testimonial from me, they are too well known, but the results of the continuous working of those machines may be obtained by a week's ramble through our western mines. Fourth, such prices as could be attached to descriptions of machinery as herein described, would be so unreliable that they would be misleading, and even a fair approximation could only be arrived at after each appliance had been properly specified, and to go into detail with anything like precision would entail an amount of labour not justified by the provisions of this essay. Any respectable manufacturer would supply such information on receipt of specifications which meant bona fide business.

**BRONFLOYD.—J. Davis, Aug. 6: Settings for August: No. 38 North Lode.** The stop over the 96 west, to four men, at 100*s.* per cubic fathom. The lode yields 1½ ton of lead ore per fathom. Balcombe's cross cut, to two men, at 180*s.* per fathom. We have intersected a joint similar to a footwall, the lode is now dry, and the water is coming out from this joint, and it is not expected that the lode will be cut in 2 or 3 ft. more, to make sure we are right through the lode, and then to put the men back to within 6 ft. of the 84, and drive west on a level of, I believe, the middle lode, which good stones of lead ore, and lets out a stream of water. Jones's winze, under 82 east, to four men, at 180*s.* per fathom. The lode yields 15 cwt. of lead ore per fathom. It was sunk 2 fms. 6 ft. 6 in. last month, and its depth now is 7 fms. 1 ft. 6 in. It is expected that about 1½ fms. more sinking will communicate with the stop over the 73 fm. level. Jenkins's cross-cut, south from the 62 east, to two men, at 120*s.* per fathom. The lode produces small ribs of lead ore, and we see no signs of the lode. This was extended last month, 1 fm. 6 ft. 6 in., and the length of cross-cut is now 5 fms. 2 ft. 6 in. In Joshua's winze, under the 84 west, the lode there yields 15 cwt. of lead ore per fathom. The ground here being hard the winze was only sunk 7 ft. last month, and its depth is now 4 fms. 2 ft. 6 in. The stop over and close to the western end of the 84, to six men, at 120*s.* per fathom. This stop yields 1½ ton of lead ore per fathom. The stop over the 73 fm. level, west of the masonry arch, to six men, at 150*s.* per cubic fathom; produces 1½ ton of lead ore per fathom. The tribute pitch over the 52 east, yields a quantity of lead ore.—No. 2 Shaft, Middle Lode: Lloyd's cross-cut, south from the 52 west, to two men, at 180*s.* per fathom. This continues without change the ground is hard to drive. It was extended last month 5 ft. 3 in., and is now 3 fms. 1 ft. The machinery is in good order.

**BURRA BURRA (KENWYN).**—The 40 and east is still improving, making rich yellow ore on the footwall of the lode, a true indication of coppering the course of ore that will, no doubt, be met with as soon as they have reached the lead lode, which they must now do in a few feet further driving. A parcel of dressed blende (more than 100 tons) have this week been sent to the buyers, and they are dressing further quantities of both copper and blende another sale. They are in daily expectation of cutting the lode in Stroud, and when they do so it is the opinion of everyone that, from the indications presented at surface, the lode will turn out rich.







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Obtained the PRIZE MEDALS at the "ROYAL EXHIBITION" of 1851; at  
 the "INTERNATIONAL EXHIBITION" of 1862, in London; at the "IMPERIAL  
 EXPOSITION," held in Paris, in 1865; at the "INTERNATIONAL EXHIBI-  
 TION," in Dublin, 1865; at the "UNIVERSAL EXPOSITION," in Paris, 1867  
 and at the "GREAT INDUSTRIAL EXHIBITION," at Altona, in 1869.



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 SAFETY-FUSE, having been informed that the name of  
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 following declaration as to the circulation of these two newspapers.

The average circulation of the "Newcastle Daily Chronicle," as declared before the Right Worshipful the Mayor of Newcastle-  
 Tyne, up to June 18, 1873, was

**35,534.**

From the detailed statement herewith annexed of the circulation of the "Newcastle Daily Chronicle" since that date it will  
 be seen that the average circulation is upwards of

**40,000**

Copies per day, which is believed to be  
 THE LARGEST CIRCULATION OF ANY PROVINCIAL DAILY NEWSPAPER.

The circulation of the "Newcastle Weekly Chronicle" is upwards of

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Copies per week, and it is believed to be  
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**DECLARATION OF GEORGE NESBITT, Public Accountant, Fellow of the**

Manchester Institute of Accountants:—

I, GEORGE NESBITT, of 11, Cross-street, in the city of Manchester, in the county  
 of Lancaster, Public Accountant, do solemnly and sincerely declare:—

1. That I have had produced to me, and have examined, all the publishing books  
 and accounts, and the invoices and receipts for paper supplied by the manu-  
 facturers, from the Twenty-fourth day of March to the Fourteenth day of  
 June, 1873, to the proprietors of the NEWCASTLE DAILY CHRONICLE and the  
 NEWCASTLE WEEKLY CHRONICLE Newspapers, which are printed and pub-  
 lished at the borough and county of Newcastle-upon-Tyne and elsewhere.

2. That the number of copies of the NEWCASTLE DAILY CHRONICLE, printed  
 and published at the Publishing Office in Westgate-road, Newcastle-upon-  
 Tyne aforesaid, from the Twenty-fourth day of March to the Fourteenth day  
 of June, 1873, amounts to

**2,558,490**

3. That the said number of 2,558,490 copies of the said newspapers, so printed  
 as aforesaid, gives for the period of Seventy-two Days, being the number of  
 publishing days between the said Twenty-fourth day of March and the  
 Fourteenth day of June, an average of

**35,534**

COPIES PER DAY.

4. That the number of copies of the NEWCASTLE WEEKLY CHRONICLE, printed  
 and published at the Publishing Office in Westgate-road, Newcastle-upon-  
 Tyne aforesaid, from and with the Twenty-ninth day of March to and with  
 the Fourteenth day of June, 1873, amounts to

**378,250.**

5. That the said number of 378,250 copies of said NEWCASTLE WEEKLY  
 CHRONICLE, so printed as aforesaid, gives for the period of Twelve Weeks,  
 being the number of publishing weeks between the said Twenty-ninth day  
 of March and the Fourteenth day of June, an average of

**31,521**

COPIES PER WEEK.

And I make this solemn declaration, conscientiously believing the same to be  
 true, and by virtue of the provisions of an Act made and passed in the sixth year  
 of the reign of His late Majesty King William the Fourth, intituled, "An Act to  
 repeal an Act of the present Session of Parliament intituled an Act for the more  
 Effectual Abolition of Oaths and Affirmations taken and made in various depart-  
 ments of the State, and to substitute declarations in lieu thereof, and for the more  
 entire suppression of voluntary and extra judicial oaths and affidavits, and to  
 make other provisions for the abolition of unnecessary oaths."

GEORGE NESBITT, F.M.I.A.

Declared at the Town Hall, Newcastle-upon-Tyne aforesaid, this Sixteenth day  
 of June, 1873, before me.

RICHD. CAIL, Mayor,  
 One of her Majesty's Justices of the Peace acting in and for  
 the borough and county of Newcastle upon Tyne.

## The Number of Copies of

**THE NEWCASTLE DAILY CHRONICLE**

Printed during the week commencing June 16 was

ON MONDAY	...	JUNE 16	...	41,700
ON TUESDAY	...	JUNE 17	...	36,500
ON WEDNESDAY	...	JUNE 18	...	36,500
ON THURSDAY	...	JUNE 19	...	36,500
ON FRIDAY	...	JUNE 20	...	37,500
ON SATURDAY	...	JUNE 20	...	36,500

TOTAL NUMBER FOR SIX ISSUES

224,700

## The Number of Copies of

**THE NEWCASTLE DAILY CHRONICLE**

Printed during the week commencing June 23 was

ON MONDAY	...	JUNE 23	...	40,000
ON TUESDAY	...	JUNE 24	...	36,000
ON WEDNESDAY	...	JUNE 25	...	36,000
ON THURSDAY	...	JUNE 26	...	36,000
ON FRIDAY	...	JUNE 27	...	40,000
ON SATURDAY	...	JUNE 28	...	40,000

TOTAL NUMBER FOR SIX ISSUES

224,000

## The Number of Copies of

**THE NEWCASTLE DAILY CHRONICLE**

Printed during the week commencing June 30 was

ON MONDAY	...	JUNE 30	...	40,000
ON TUESDAY	...	JULY 1	...	36,000
ON WEDNESDAY	...	JULY 2	...	36,000
ON THURSDAY	...	JULY 3	...	36,000
ON FRIDAY	...	JULY 4	...	40,000
ON SATURDAY	...	JULY 5	...	40,000

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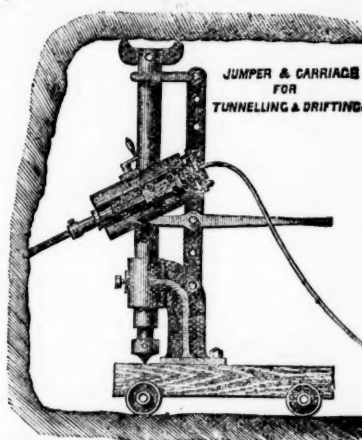
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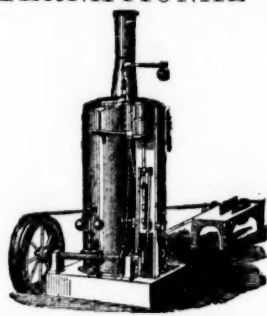
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CORNISH MINING.—To show the importance of consulting  
practical authority, I have only to draw attention to the following fluctua-  
tions during the current year, and as the various companies are most loudly advo-  
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vidence, from £20 to £10 and £11; West Fraces, West Seton, Cook's Kitchen,  
Devon, North Levant, Wheel Bassett, South Condurrow, and Herodsfoot, from  
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## THE MINING SHARE LIST.

BRITISH DIVIDEND MINES.									
Shares.	Mines.	Paid.	Last Pr.	Clos. Pr.	Total divs.	Per share.	Last paid		
1500	Alderley Edge, c, Cheshire*	10 0 0	—	—	11 11 0	0 5 0	Apr. 1873		
20000	Ally-Crib, t, Talbot*	2 0 0	—	—	0 0 0	0 0 0	Feb. 1873		
30000	Bampfylde, c, t, Devon*	1 0 0	5 5 5	5 5 5	0 2 0	0 2 0	June 1873		
5000	Blaen Caelan, s, t, Cardigan*	3 10 0	—	—	0 10 0	—	—		
18000	Boscawell Downs, t, c, St. Just*	3 0 0	—	—	0 0 0	0 0 0	Oct. 1871		
200	Botallack, t, c, St. Just*	91 5 0	12 5 0	135 140	619 15 0	0 0 0	Aug. 1872		
500	Brontford, t, s, t, (2000 sh. B. Sp. t.)	100 0 0	—	—	110 0 0	0 0 0	Jan. 1873		
4345	Cargill, s, t, Newlyn	1 16 0	—	—	2 8 0	0 4 0	Mar. 1873		
4000	Cashwell, t, Cumberland*	2 10 0	—	—	4 16 3	0 12 6	Oct. 1872		
7500	Castle-an-Dinas, t, St. Columb*	2 0 0	—	—	1 4 0	0 4 0	Aug. 1873		
1000	Carn Brea, c, t, Illogan*	35 0 0	90	87 5 9 5 5	306 0 0	0 2 0	July 1873		
6000	Cath & Jane, t, Penrynendreaeth	5 0 0	—	—	0 7 6	0 7 6	July 1873		
2450	Cook's Kitchen, t, Illogan*	19 14 9	18	18 19	11 17 0	0 7 6	Jan. 1873		
10240	Devon Gt. Consols, c, Tavistock*	2 0 0	2 2 5	2 2 5	116 0 0	0 12 0	May 1872		
4296	Dolcoath, c, t, Camborne*	40 48	—	—	103 1 8	0 15 0	Aug. 1873		
10000	East Baleswiden, t, Sancreed*	1 0 0	5 2 5	5 2 5	0 1 8	0 0 5	May 1873		
6144	East Carden, c, St. Cleer*	2 14 6	2	1 5 1 5	14 19 0	0 2 0	Oct. 1872		
300	East Durren, t, Cardiganshire	32 0 0	—	—	213 10 0	0 1 0	Apr. 1873		
4000	East Pool, t, c, Illogan*	0 9 9	9	8 9	13 11 3	0 2 6	May 1873		
6000	Exmouth, s, t, Christow*	0 7 8	—	—	0 1 0	0 1 0	May 1873		
2800	Foxdale, t, Isle of Man*	25 0 0	—	—	80 15 0	0 10 0	Sept. 1872		
3950	Gawton, c, Tavistock*	3 10 6	1 5 5	1 5 5	0 13 0	0 0 5	May 1872		
40000	Glasgow Carr, c, (30,000 sh. p., 10,000 sh. p.)	158 p.	—	—	556 19 0	0 4 0	Nov. 1872		
18000	Great Laxey, t, c, Helston*	4 0 0	4 5 5	4 5 5	0 12 6	0 4 0	Apr. 1873		
4000	Green Hurth, t, Cumberland*	0 6 0	—	—	16 1 0	0 10 0	June 1873		
1024	Herodsfoot, t, near Liskeard*	8 10 0	7	6 7	15 19 6	0 2 6	June 1872		
6000	Hingston Downs, c, Calstock*	6 4 0	4 5 5	4 5 5	4 3 0	0 0 5	Dec. 1872		
25000	Killaloe, s, t, Tipperary*	1 0 0	—	—	0 3 11 5	0 0 6	Mar. 1873		
6000	Killreath, t, Chacewater*	1 0 0	—	—	0 2 0	0 2 0	Jan. 1873		
400	Lisburne, t, Cardiganshire	19 15 0	—	—	0 12 6	0 4 0	Apr. 1873		
2784	Lovell, t, Wendron*	5 0 0	—	—	62 13 8	0 10 0	May 1873		
6000	Minera Mining Co., t, Wrexham*	3 0 0	35	30 35	0 8 0	0 3 6	July 1872		
20000	Minning Co. of Ireland, c, t, *	7 0 0	5 5 5	5 5 5	0 17 0	0 4 0	July 1872		
6400	New Pembroke, t, c, Par Station	5 0 0	—	—	0 8 0	0 2 6	June 1872		
12000	North Hendre, t, Wales	2 10 0	—	—	4 13 0	0 12 0	Sept. 1872		
2000	North Lant, t, c, St. Just	10 12 0	8	6 8	0 8 0	0 0 5	Nov. 1871		
5004	Pedn-an-drea, t, Redruth	8 2 0	—	—	2 18 5	0 3 0	May 1873		
6000	Penhalls, t, St. Agnes	3 0 0	3	2 5 3	39 19 0	0 5 0	Mar. 1872		
6000	Phenix, t, c, Linkinhorne	4 3 4	—	—	1 10 0	0 10 0	Oct. 1872		
1772	Polberr, t, St. Agnes	15 0 0	—	—	0 3 0	0 2 0	June 1873		
2800	Polidice, t, c, Penrynendreaeth	10 0 0	—	—	0 10 0	0 10 0	Sept. 1872		
18000	Prince Patrick, s, t, Helwell	1 0 0	—	—	104 12 6	0 10 0	Sept. 1872		
1120	Providence, t, t, Uny Lelant*	12 6 7	9	8 9	0 1 1	0 1 1	Sept. 1872		
12000	Roman Gravel, t, Salop*	7 10 0	21 5 5	20 21	0 1 0	0 1 0	Feb. 1872		
10000	Shelton, c, t, St. Austell	1 0 0	—	—	708 19 0	0 4 0	Nov. 1872		
6000	Slimeford Dressing, t, Calstock*	1 0 0	—	—	0 10 0	0 2 6	July 1872		
1000	South Carden, c, St. Cleer	1 5 0	125	90 100	1 1 6	0 1 6	Nov. 1870		
6000	South Carr Brea, c, t, Illogan	3 0 0	3 5 5	3 5 5	17 5 0	0 10 0	June 1872		
248	St. Just, t, c, St. Just	38 17 9	—	—	0 10 0	0 10 0	May 1869		
248	St. Ives Consols, t, St. Ives	10 15 0	11	9 10	0 9 0	0 4 0	Nov. 1871		
8771	St. Just Amalgamated, t, *	3 10 0	—	—	0 3 0	0 6 0	Feb. 1873		
12000	Tankerville, t, Salop*	6 0 0	12	11 5 12 5	0 3 0	0 1 6	Oct. 1872		
25000	Terras, t, St. Austell*	1 0 0	—	—	0 3 0	0 1 6	Oct. 1872		
6000	Tincroft, c, t, Pool, Illogan	9 0 0	48	45 47	45 3 6	0 12 0	July 1873		
4000	Trumpet Consols, t, Helston	5 15 0	—	—	0 10 0	0 10 0	June 1873		
15000	Van, t, Llanidloes	4 5 0	—	—	32 10 0	0 5 0	Oct. 1872		
3600	West Wharf, t, Penrynendreaeth	28 13 9	15	8 10	0 13 6	0 2 6	Sept. 1872		
512	Wheel Basset, t, Illogan*	5 2 6	55	55 57 5	0 8 0	0 10 0	Aug. 1872		
5174	Wheel Basset, c, Camborne*	5 2 6	55	55 57 5	0 13 6	0 2 6	Sept. 1872		
4295	Wheel Basset, t, St. Agnes	5 2 6	55	55 57 5	0 8 0	0 10 0	May 1873		
896	Wheel Margaret, t, Uny Lelant*	13 17 6	5 5 5	4 5 5 5	0 1 0	0 1 0	Jan. 1873		
10000	Wheel Mary, t, St. Dennis*	5 0 0	5 5 5	5 5 5	0 1 0	0 1 0	Jan. 1873		
1024	Wheel Mary Ann, t, Menheniot*	10 0 0	—	—	522 10 0	0 4 0	Aug. 1872		
80	Wheel Owles, t, St. Just	70 0 0	—	—	0 2 0	0 1 0	June 1871		
12000	Wheel Seton, t, Camborne*	73 0 0	—	—	255 15 0	0 1 0	June 1873		
15000	Wheel Tregoes, t, Roche	1 0 0	—	—	0 1 0	0 1 0	Jan. 1873		
10000	Wheel Whisper, t, c, Warleggan*	1 0 0	—	—	0 1 6	0 6 0	May 1873		
25000	Wicklow, c, s, t, Wicklow	2 10 0	—	—	52 9 0	0 2 6	Mar. 1872		

## FOREIGN DIVIDEND MINES.

Shares.	Mines.	Paid.	Last Pr.	Clos. Pr.	Total divs.	Per share.	Last paid		
35000	Alamillos, t, Spain*	2 0 0	2 5 5	2 5 5	1 1 9	0 2 6	Mar. 1873		
30000	Almaden and Tinto Consols, s, t, *	1 0 0	1 5 5	1 5 5	0 4 3	0 1 0	May 1873		
20000	Australian, c, South Australia*	7 7 6	3	1 5 2	0 11 6	0 2 0	July 1873		
10000	Battle Mountain, c, (2040 part pd.)	5 0 0	—	—	0 10 0	0 10 0	Nov. 1872		
16000	Birdseye Creek, c, California*	4 0 0	2	2 2 5	0 9 0	0 2 0	July 1873		
6000	Bensberg, t, Germany*	10 0 0	—	—	0 17 0	0 10 0	Oct. 1872		
12320	Burra Burra, s, c, So. Australia	5 0 0	23 5	23 24	12 15 0	0 10 0	June 1873		
20000	Cape Copper Mining, t, Africa*	5 0 0	1 5 5	1 5 5	0 5 0	0 2 6	June 1873		
16000	Cedar Creek, c, California*	0 15 0	—	—	0 6 0	0 1 0	July 1869		
30000	Central American Association*	4 0 0	—	—	0 12 0	0 4 0	Aug. 1872		
15000	Chicago, s, t, Utah*	4 0 0	4 5 5	4 5 5	0 8 0	0 2 0	Oct. 1871		
21000	Colorado Terrible, s, t, Colorado*	5 0 0	3 5 5	3 5 5	2 5 0	0 2 0	Mar. 1872		
74182	Don Pedro North of the Key*	0 14 0	—	—	1 0 0	0 1 0	Mar. 1872		
23500	Eberhardt and Aurora, s, Nevada*	10 0 0	6	5 5 5 5	1 0 0	0 1 0	Mar. 1872		
2352	Eldorado, c, Nova Scotia*	10 0 0	—	—	2 7 3	0 2 6	Mar. 1873		
50000	Emma, s, t, Utah (25,000 fully pd.)	20 0 0	3 5 5	4 5 5	0 3 0	0 3 0	Apr. 1872		
70000	English and Australian, c, St. Aust.	2 0 0	2 5 5	1 5 2 5	0 3 0	0 3 0	Apr. 1872		
15000	Flagstaff, t, Utah*	10 0 0	10 5	10 5 10 5	4 2 0	0 5 0	July 1873		
25000	Fortuna, t, Spain*	2 0 0	6 5 5	6 5 5	0 2 4	0 5 0	May 1872		
50000	Gold Run, s, t, Idaho*	1 0 0	—	—	0 14 0	0 2 6	June 1873		
60000	Kapunda Mining Co. Australia*	1 3 0	—	—	1 4 0	0 1 6	Mar. 1873		
20000	Last Chance, s, t, Utah*	5 0 0	—	—	1 1 6	0 1 6	Mar. 1873		
16000	Linsate, t, Spain*	3 0 0	4 5 5	4 5 5	0 5 0	0 5 0	Dec. 1872		
7837	Lusitania, Portugal (25 shares)	10 0 0	—	—	0 4 0	0 4 0	Jan. 1873		
16000	Mammoth Copperopolis of Utah, c, s	10 0 0	—	—	3 0 0	1 4 0	Sept. 1872		
5000	Mercurio, t, t, Utah*	30 0 0	—	—	13 13 11	0 19 6	June 1873		
18000	Preussische Berg- & Hütten, c, t, *	20 0 0	21	19 21	1 8 0	0 1 0	Jan. 1873		
10000	Pontgibaud, s, t, France*	20 0 0	1 1 5	1 1 5	0 4 0	0 4 0	Apr. 1872		
10000	Port Phillip, t, t, Clunes*	1 0 0	—	—	8 percent.	—	—		
44000	Richmond Consols, s, Nevada*	5 0 0	6 5 5	6 5 5	0 12 0	0 5 0	June 1871		
120000	Scottish Australian Mining Co. t, *	1 0 0	1 5 5	1 5 5	1 18 0	0 4 0	June 1872		
112500	Sierra Buttes, c, California*	2 0 0	3 5 5	3 5 5	0 5 0	0 2 6	Nov. 1872		
60000	South Aurora, t, Nevada*	4 0 0	5	4 5 5	25 10 0	0 5 0	Dec. 1872		
15000	Sweetland Creek, c, California*	3 0 0	—	—	0 5 0	0 2 6	Nov. 1872		
30000	Tollara, s, t, (2000 sh. are 25 f. pd.)	3 0 0	—	—	0 5 0	0 2 6	Nov. 1872		
500	Westphalian, s, t, c, Prussia*	20 0 0	—	—	25 10 0	0 5 0	Dec. 1872		

## NON-DIVIDEND FOREIGN MINES.

Shares.	Mines.	Paid.	Last Pr.	Clos. Pr.	Last Coll.
50000	Anglo-Argentine, s, t, (15 per cent. Preference)	1 0 0	—	—	—
20000	Anglo-Australian, c, Victoria*	2 10 0	—	—	—
50000	Aruba, c, Dutch, West Indies*	10 0 0	—	—	—
30000	Australian United, c, Victoria*	2 10 0	—	—	—
3000	Bellavista, s, t, Peru (210 shares)	8 10 0	—	—	—
50000	Branzao, c, Brazil*	0 15 0	—	—	—
12000	Camp Floyd, t, Utah*	10 0 0	—	—	—
50000	Cesena Sulphur Company, Romanga, Italy*	10 0 0	—	—	—
50152	Chontales, s, t, Nicaragua* (and 12,542 of £1 15s.)	2 0 0	—	—	—
6000	Clifton, s, Colorado*	10 0 0	—	—	—
10000	Crescent, c, Plumas County, California*	10 0 0	—	—	—
100000	Cuba, c, Minas Geraes, Brazil*	5 0 0	—	—	—
10000	Douglas, s, t, Georgetown, Guyana*	2 0 0	—	—	—
7500	East Shearvan Preference* (40,000 ordinary shares)	2 0 0	—	—	—
30000	Excelsior Hydraulic Gold Washing Co., California*	6 0 0	—	—	—
40000	Exchequer, c, t, California*	1 0 0	—	—	—
55000	Frontino and Bolivia, c, New Granada*	2 0 0	—	—	—
50000	General Brazilian, s, *	1 0 0	—	—	—
10000	Goetz Tunnel Co., Georgetown, Col.	7 0 0	—	—	—
40000	Holcombe Valley, s, t, California	3 0 0	—	—	—
10000	Hudson, c, California	1 0 0	—	—	—
24000	Hunter's Comet, c, Australia*	5 0 0	—	—	—
20000	Imperial Brazilian Collieries, Brazil*	5 0 0	—	—	—
20000	J. X. L., t, t, California*	2 0 0	—	—	—
20000	Jaravi, c, Nicaragua*	2 0 0	—	—	—
11000	Kansas, c, Colorado*	5 0 0	—	—	—
12000	Lanestosa, s, t, t, Viscaya, Spain (22 shares)	1 5 0	—	—	—
15000	London and California, s, t, *	2 0 0	—	—	—
75000	Malabar, c, Colombia* (25000 issued)	6 12 6	—	—	—
4000	Malaga, t, Spain*	10 0 0	—	—	—